This is a digital copy of a book that was preserved for generations on library shelves before it was carefully scanned by Google as part of a project to make the world's books discoverable online.

It has survived long enough for the copyright to expire and the book to enter the public domain. A public domain book is one that was never subject to copyright or whose legal copyright term has expired. Whether a book is in the public domain may vary country to country. Public domain books are our gateways to the past, representing a wealth of history, culture and knowledge that's often difficult to discover.

Marks, notations and other marginalia present in the original volume will appear in this file - a reminder of this book's long journey from the publisher to a library and finally to you.

Usage guidelines

Google is proud to partner with libraries to digitize public domain materials and make them widely accessible. Public domain books belong to the public and we are merely their custodians. Nevertheless, this work is expensive, so in order to keep providing this resource, we have taken steps to prevent abuse by commercial parties, including placing technical restrictions on automated querying.

We also ask that you:

+ *Make non-commercial use of the files* We designed Google Book Search for use by individuals, and we request that you use these files for personal, non-commercial purposes.

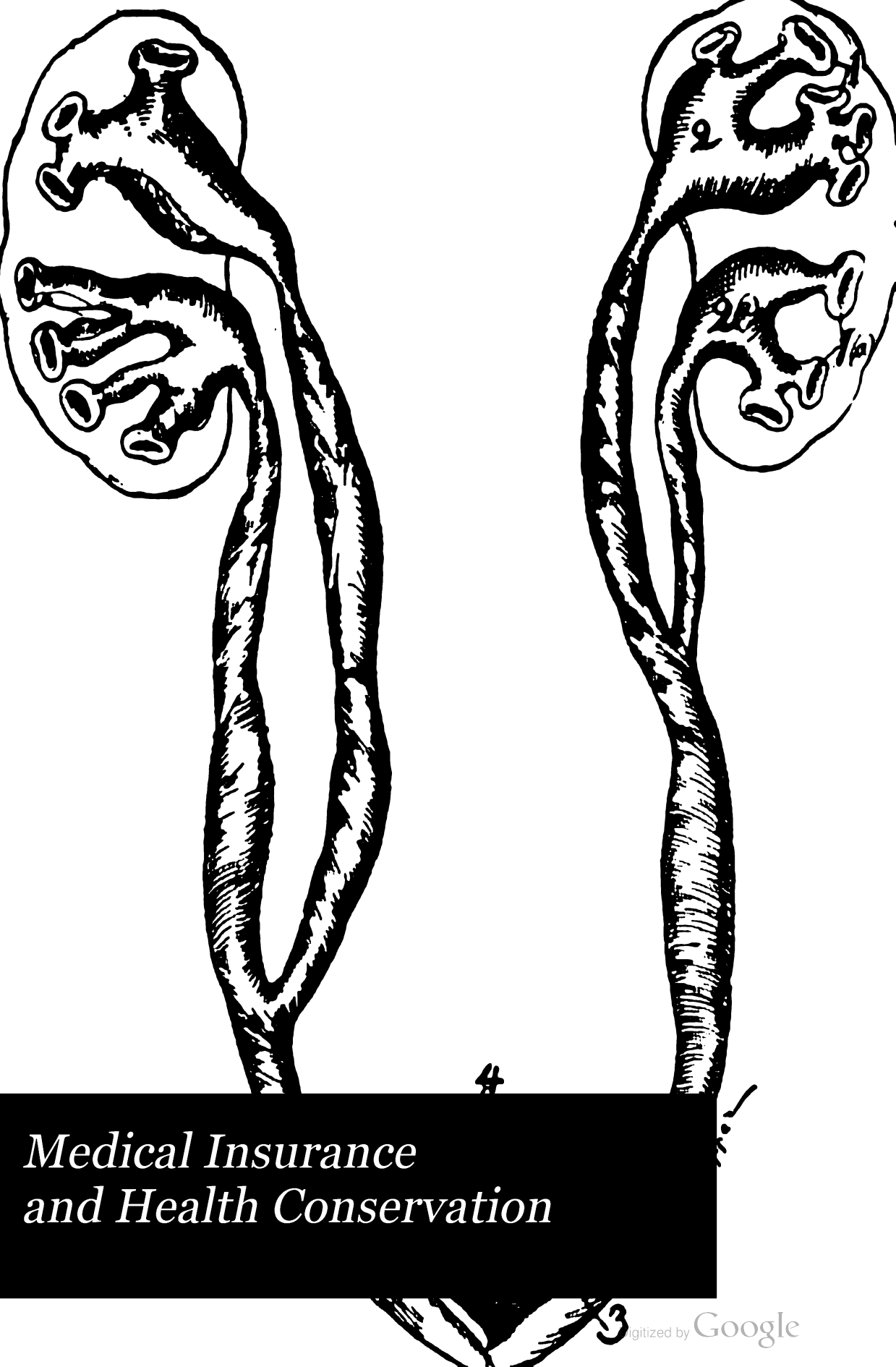
+ *Refrain from automated querying* Do not send automated queries of any sort to Google's system: If you are conducting research on machine translation, optical character recognition or other areas where access to a large amount of text is helpful, please contact us. We encourage the use of public domain materials for these purposes and may be able to help.

+ *Maintain attribution* The Google "watermark" you see on each file is essential for informing people about this project and helping them find additional materials through Google Book Search. Please do not remove it.

+ *Keep it legal* Whatever your use, remember that you are responsible for ensuring that what you are doing is legal. Do not assume that just because we believe a book is in the public domain for users in the United States, that the work is also in the public domain for users in other countries. Whether a book is still in copyright varies from country to country, and we can't offer guidance on whether any specific use of any specific book is allowed. Please do not assume that a book's appearance in Google Book Search means it can be used in any manner anywhere in the world. Copyright infringement liability can be quite severe.

About Google Book Search

Google's mission is to organize the world's information and to make it universally accessible and useful. Google Book Search helps readers discover the world's books while helping authors and publishers reach new audiences. You can search through the full text of this book on the web at `http://books.google.com/`



Medical Insurance and Health Conservation

Digitized by Google

NEURASTHENIA

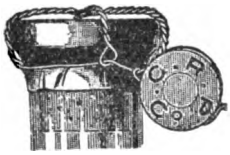
IS ANOTHER OF THE NERVOUS AFFECTIONS IN WHICH

ARSENAURO

HAS DEMONSTRATED ITS THERAPEUTIC EFFICIENCY.

PUSH DOSAGE TO POINT OF SATURATION IN EACH INDIVIDUAL PATIENT

EVERY GENUINE BOTTLE BEARS THIS SEAL.



CHAS. ROOME PARMELE CO., 45 JOHN ST., N. Y.

"Well borne by the most delicate stomach."

NEERGAARD'S COMPOUND SYRUP OF CREOSOTE

A combination of **Creosote** with the **Hypophosphites** which has no equal, being especially valuable in the treatment of

TUBERCULAR or suspected **TUBERCULAR CASES, BRONCHITIS, BRONCHIAL ASTHMA, CHRONIC COUGHS, ETC.**

CHARLES WYLIE,

Data Supplied on Request.

936 SIXTH AVE., NEW YORK.

Digitized by Google

Malarial Cachexia

The physician's work is not done when he has checked the paroxysms. Too many cases "hang fire." They need a constructive, restorative, building-up treatment. They need Colden's Liquid Beef Tonic to overcome the mental depression, dyspepsia, constipation, bilious attacks, enlargement of liver, dullness, cold hands and feet, secondary anemia, bad breath, coated, flabby tongue, and other morbid conditions that follow. Specify "Ext. carnis fl. Comp. (Colden)."

Colden's Liquid Beef Tonic

Literature mailed to physicians on request.

THE CHARLES N. CRITTENTON CO.
Sole Agents for the United States,
115-117 FULTON STREET, NEW YORK.

A VALUABLE REMEDY

in conditions attended with malnutrition, general debility and nervous exhaustion is

GRAY'S Glycerine TONIC Comp.

Its reputation is based upon twenty years' successes in cases unbenefited by other treatment.

THE PURDUE FREDERICK CO.,
No. 15 Murray Street, New York.

Digitized by Google

ECTHOL, NEITHER ALTERATIVE NOR ANTISEPTIC IN THE SENSE IN WHICH THOSE WORDS ARE USUALLY UNDERSTOOD. IT IS ANTI-PURULENT, ANTI-MORBIFIC--A CORRECTOR OF THE DEPRAVED CONDITION OF THE FLUIDS AND TISSUES.

SAMPLE (12-oz.) BOTTLE SENT FREE ON RECEIPT OF 25 CTS.

FORMULA:--Active principles of Echinacia and Thuja.

BROMIDIA
IODIA
PAPINE

BATTLE & CO., CHEMISTS CORPORATION, ST. LOUIS, MO., U. S. A.

Digitized by Google

ANTIPHLOGISTINE'S

THERAPEUTIC ACTION is based in theory upon the following fundamental principles, its prime object being to keep the blood circulating in the diseased part:

The blood, which normally circulates fully and freely through the vascular system, is the food supply of the millions of cells which make up the body structure. Inflammation means certain successional deviations or interferences with the circulation in some part or parts. In health, the functions of the vascular system are automatically controlled by the central nervous system. Three-fourths of the body composition is fluid—chemically speaking, water, and as a magnet has affinity for particles of steel, so Antiphlogistine has affinity for water. Antiphlogistine is an antiseptic, a nonconductor of heat and a vasomotor stimulant. The skin may be regarded as a permeable membrane, separating two fluids of different densities, the blood and Antiphlogistine. If Antiphlogistine is applied hot under such conditions something definite happens and that scientifically—an interchange of fluids, most marked towards Antiphlogistine; hence the deduction that Antiphlogistine acts through reflex action and dialysis, the latter scientifically including the physical processes of exosmosis and endosmosis.

DEEP-SEATED STRUCTURES—If Antiphlogistine is applied warm and thick, the thicker the better, for pneumonia, pleurisy, bronchitis, peritonitis, or any affection involving deep-seated structures, it maintains a uniform degree of heat for twenty-four hours or more; it stimulates the cutaneous reflexes, causing a contraction of the deep-seated and coincidently a dilatation of the superficial blood vessels; at the same time it attracts or draws the blood to the surface—flushes the superficial capillaries—bleeds but saves the blood; thus the aggravating symptoms will be almost always immediately ameliorated; congestion and pain are relieved; the temperature declines; blood pressure on the overworked heart is reduced; the muscular and nervous systems are relaxed and refreshing sleep is invited.

SUPERFICIAL STRUCTURES—It is no longer proper to treat with the old fashioned bacteria-breeding flaxseed poultice, boils, felons, sprains, chronic ulcers, inflamed glands, periostitis and other types of inflammation involving comparatively superficial tissues. Antiphlogistine is a soothing antiseptic well adapted to sensitive and abraded surfaces. It draws out or absorbs the liquid exudate from the swollen and sensitive tissues, the result being that the blood is permitted to circulate freely through the affected area and nourishment is conveyed to the injured cells. Through reflex action and endosmosis a stimulating, alterative tonic and soothing influence is exerted upon the affected cells, lymphatics and other tissues.

GENERAL DIRECTIONS—Always heat in can (never on a cloth) by placing it in hot water. Do not allow water to get into the medicine. When as hot as can be borne, take a suitable knife and apply as quickly as possible, spreading the Antiphlogistine on the skin over the affected part, at least an eighth of an inch thick and covering promptly with a liberal supply of absorbent cotton and a suitable bandage or compress. Needless exposure to the air or contact with water markedly reduces the remedial value of Antiphlogistine, hence make all applications quickly. Remove dressings as soon as they will peel off nicely—in twelve to twenty-four hours.

To insure economy and the best results always order a full package and specify the size required—Small, Medium, Large or Hospital Size.

The Denver Chemical Mfg. Co.,

(Incorporated 1893)

Home Office, DENVER.
London Office, 110 Cheapside, E. C. **NEW YORK, U. S. A.**

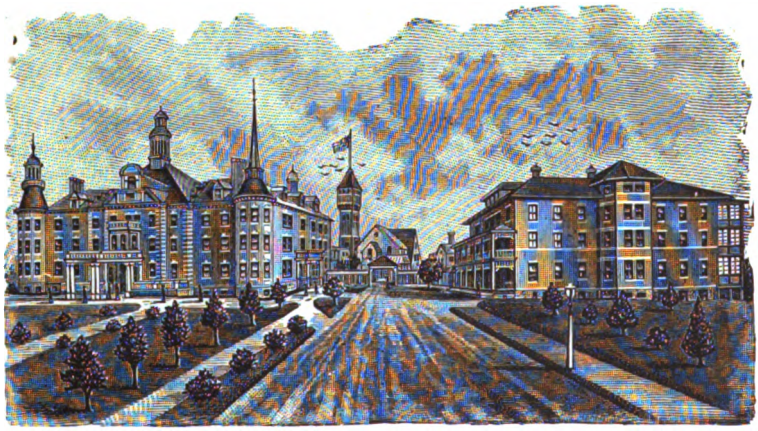
Digitized by Google

PASSIFLORA

Daniel's Conct. Tinct. Passiflora Incarnata is the truest remedy for the nervous diseases of women and children. In suppressed menstruation, dysmenorrhea, nervousness arising from overwork or complications in the female sex, Passiflora asserts its supremacy as a nerve calmative. In convalescence from La Grippe and Malarial Fever it gives rest to tired nerves and nourishment to famished organs. Unlike the opiates, its effects are natural and therefore healthful.

SAMPLE SUPPLIED, PHYSICIAN PAYING EXPRESS CHARGES.
Write for Literature.

LABORATORY OF
JNO. B. DANIEL, Atlanta, Ga.



THE CINCINNATI SANITARIUM

A PRIVATE HOSPITAL FOR MENTAL AND NERVOUS DISORDERS, OPIUM HABIT, INEBRIETY, ETC.

Thirty years successful operation. Thoroughly rebuilt, remodeled, enlarged and refurnished. Proprietary interests strictly non-professional. One hundred and fifty patients admitted annually. Detached apartments for nervous invalids, opium habit, inebriety, etc. Location retired and salubrious. Grounds extensive. Surroundings delightful. Appliances complete. Charges reasonable. Electric cars from Fountain Square, Cincinnati, to Sanitarium entrance. **Long Distance Telephone Park 135.**

DR. F. W. LANGDON, Medical Director; DR. B. A. WILLIAMS, Senior Resident Physician.

For particulars, address THE CINCINNATI SANITARIUM,
College Hill, Station K, Cincinnati, Ohio.

Digitized by Google

TISSUE BUILDING
BY
BOVININE

is most successful because **BOVININE** supplies absolute and perfect nutrition.

It not only stimulates, but completely feeds the new born blood cells, carrying them to full maturity.

It increases the leucocytes and thereby most powerfully retards pathological processes.

As a food and nutrient it is ideal, requiring little or no digestion, and being at once absorbed and assimilated.

For starving anæmic, bottle-fed babies, its results are immediate and most gratifying, as it is a ready alimentation as soon as ingested, and never causes eructation.

It will be found equally reliable for nursing mothers, affording prompt nourishment and strength to both mother and babe.

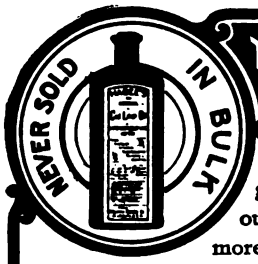
In typhoid fever and all wasting diseases it may be administered per rectum, and will sustain the strength and support the heart without need for recourse to alcoholic stimulants.

Records of hundreds of cases sent on request.

THE BOVININE COMPANY,

75 West Houston Street, NEW YORK.

Digitized by Google



THE GOODNESS ISN'T THE GREASE

There are just two things about **Cod Liver Oil**—goodness and grease. It used to be thought that you couldn't get the goodness without the grease. That's wrong. The goodness isn't the grease. It is no more necessary to swallow the nauseous grease of **Cod Liver Oil** to get the valuable principles, than it is to eat the shell of an egg to get the meat.

Right there you have the whole secret of the incalculable value of

HAGEE'S CORDIAL OF COD LIVER OIL COMP.

In separating the grease from the valuable properties, nothing is lost in the process. You get all that **Cod Liver Oil** is famed for, joined with the hypophosphites of lime and soda in a pleasant cordial, without a trace of the dreaded taste. Instead of being greasy, it is delightful to take. Instead of a fishy smell, it has an appetizing odor. **Hagee's Cordial** is not a patent medicine. There's nothing mysterious about it. We have simply taken a disagreeable but good remedy, and made it better by making it palatable.

FORMULA ON EVERY BOTTLE

Prescribe

CORD. OL. MORRHUAE COMP. (HAGEE)

AND JUDGE OF THE MERITS BY RESULTS

PUT UP IN 16 OZ BOTTLES ONLY.

Katharmon Chemical Co. St. Louis, Mo.

DOSE
One to three teaspoonfuls, according to the amount of Bromides required

THE BEST RESULTS
Are assured in Bromide treatment when you specify

FORMULA
Each fluid drachm represents 15 grains of the combined C. P. Bromides of Potassium, Sodium, Calcium, Ammonium and Lithium

PEACOCK'S BROMIDES

AND THE GENUINE IS DISPENSED

Half-pound bottles only

For Physicians' Prescriptions

Neurologists and General Practitioners prefer it because of its superior qualities over the commercial salts.

For clinical trial we will send full size bottle of either or both preparations to any physician who will pay exp. charges

Hepatic Stimulation **Without Catharsis**

CHIONIA

DOSE
One to two teaspoonfuls three times a day

Re-establishes portal circulation without producing congestion
Invaluable in all ailments due to hepatic torpor

PEACOCK CHEMICAL CO., ST. LOUIS, MO., U. S. A.

FORMULA
Prepared from Chionanthus Virginica, from which the inert and nauseating features of the drug have been eliminated

Digitized by Google

Written Endorsements From More Than 8000 Physicians.

VIN MARIANI INTRODUCED NEARLY HALF A CENTURY AGO:

"The Preparation which made Coca known as a remedy!"

Priority, Facilities and Processes of Manufacture

MAINTAIN MARIANI COCA PREPARATIONS INIMITABLE.

AVOID "COCA WINES" Extemporaneously made with **Cheap Wine and Cocaine.**

Substitutes harm Patient and Physician and betray confidence in the unique properties of Coca.

VIN MARIANI

Represents TRUE COCA with a Sound Nutritious FRENCH WINE;

An Adjuvant to all other Remedies in

Convalescence — Wasting Diseases — Neurasthenia

THE COCA LEAF

A PERIODICAL ADVOCATING
THE RATIONAL USES OF COCA
MAILED FREE
TO PHYSICIANS ON REQUEST.

And Allied Conditions from any cause.

Inquiries from Physicians Receive Ethical Consideration.

MARIANI & CO.,

52 West 15th Street, New York.

PARIS, LONDON, BERLIN, MONTREAL. Laboratories: Neuilly Sur-Seine, FRANCE.

H. S. Kennedy's Extract of Pinus Canadensis.

RIO

[Dark and White]

THE ONLY NON-IRRITATING MUCUOS ASTRINGENT.

It has proven to be of priceless value to the Physician in the treatment of

Gonorrhea, Gleet, Vaginitis, Catarrh, Ulcers, etc.
A specific for night sweats.

Rio Chemical Co. New York.

SANMETTO FOR GENITO-URINARY DISEASES.

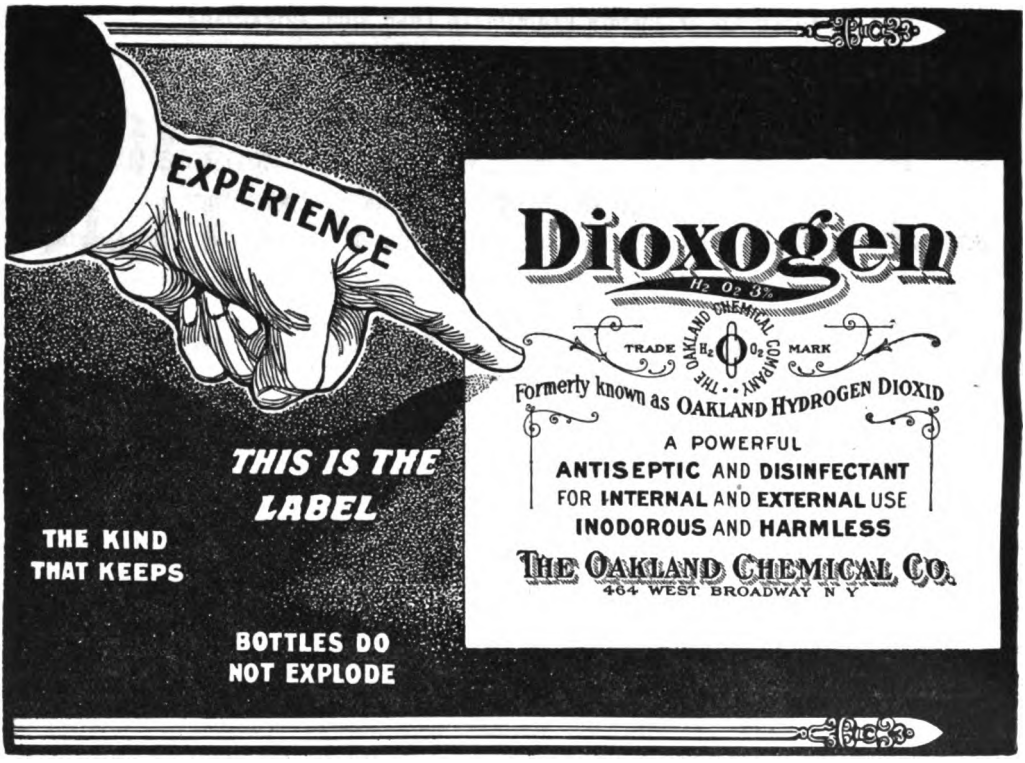
A Scientific Blending of True Santal and Saw Palmetto in a Pleasant Aromatic Vehicle.

A Vitalizing Tonic to the Reproductive System.

SPECIALLY VALUABLE IN
PROSTATIC TROUBLES OF OLD MEN—IRRITABLE BLADDER—
CYSTITIS—URETHRITIS—PRE-SENILITY.

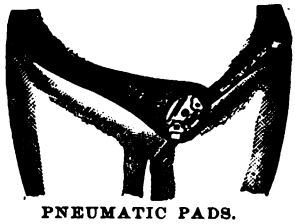
DOSE:—One Teaspoonful Four Times a Day. OD CHEM. CO., NEW YORK.

Digitized by Google



Flavell's Elastic Trusses,

Can be worn day and night.



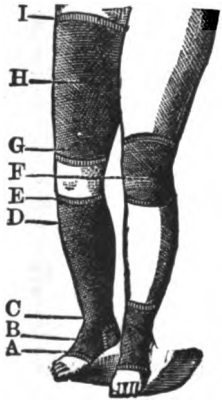
PNEUMATIC PADS.

SINGLE TRUSS	Adults
A. Plain	$1.50
B. Fine	2.00
C. Silk	2.50
DOUBLE TRUSS	**Adults**
A. Plain	$2.50
B. Fine	3.00
C. Silk	4.00

Give circumference of abdomen on line of Rupture. State it for Right or Left.

ELASTIC STOCKINGS.

Give exact Circumference and Length in all cases.



Net Price to Physicians.

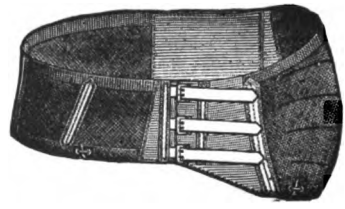
	Stout Silk each	Fine Silk each	Thread each
A to E	$2.50	$2.00	$1.50
A to G	4.25	3.50	2.50
A to I	6.00	5.00	4.50
C to E	1.50	1.25	1.00
E to G	1.50	1.25	1.00
A to C	1.50	1.25	1.00

Goods sent by Mail upon receipt of price.

Safe delivery guaranteed.

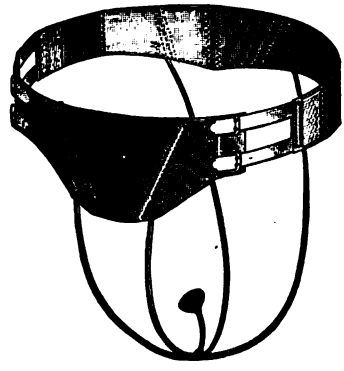
We Solicit the Physician's Patronage Direct.

Abdominal Supporter.



Silk Elastic - - $3.25
Thread Elastic - - 2.50

FLAVELL'S UTERINE SUPPORTER.



Give measure 2 inches below Navel.

State if for Prolapsus, Retroversion, or Anteversion.

Net Price to Physicians $2.00

Send Your Orders Direct to

G. W. FLAVELL & BRO.

1005 Spring Garden St., Philadelphia, Pa.

Digitized by Google

Buffalo LITHIA WATER

OF GREAT VALUE IN URIC ACID DIATHESIS, GOUT, RHEUMATISM AND RENAL CALCULUS, WHICH IT DISSOLVES AND ELIMINATES.

Dr. ALFRED H. LOOMIS, late Professor of Pathology and Practical Medicine in the Medical Department of the University of New York, wrote: "For the past four years I have used BUFFALO LITHIA WATER in the treatment of Chronic Bright's Disease of the Kidneys, occurring in Gouty and Rheumatic subjects with marked benefits."

Dr. THOMAS P. MATHEWS, of Manchester, Va., Member of the Board of Visitors, Medical College, Virginia: "I am satisfied from my own use and from results in many cases in my practice that BUFFALO LITHIA WATER is a wonderfully potent remedy in Urid Acid Diathesis and in Gouty Rheumatic conditions. It has Powerful Effect in the Disintegration and Removal of Renal Calculi."

Dr. J. ALLISON HODGES, President and Professor of Nervous and Mental Diseases, University College of Medicine, Richmond, Va.: "Clinical experience in many cases has taught me that if my patients need Lithia, I invariably get the best results when I prescribe BUFFALO LITHIA WATER pure and simple, for its therapeutic effects, in my practice, have been vastly superior to those obtained from Lithia Tablets or other Lithia preparations."

JOHN V. SHOEMAKER, M. D., LL. D., Professor of Materia Medica and Therapeutics in the Medico-Chirurgical College of Philadelphia, etc., in the N. Y. Med. Journal, of July 22, 1899: "The BUFFALO LITHIA WATER is doubly efficient in rheumatism and gout. It dissolves uric acic and phosphatic sediments as well as other products difficult of elimination, while at the same time it exerts a moderately stimulant effect upon the renal cells, and thereby facilitates the swift removal of insoluble material from the body."

Dr. C. C. McDOWELL, Baltimore, Md., Member of Medico-Chirurgical Faculty of Maryland, says: "I have been using BUFFALO LITHIA WATER in the treatment of Scarlatinal Nephritis for years with most gratifying results."

Dr. W. H. DOUGHTY, Augusta, Ga., formerly Professor of Materia Medica and Therapeutics, Medical College of Georgia, says: "In Typhoid and Typho-Malarial Fevers it is my custom to substitute the BUFFALO LITHIA WATER for ordinary drinking water, and with excellent results. The following considerations prompt its use: (1) The certainty of securing a pure water; (2) It promotes the continuous free action of the kidneys, a great desideratum in Typhoidal diseases; for this purpose I think it largely supersedes medical remedies proper; (3) It allays irritability of the stomach and preserves the integrity of the digestive organs, a matter of great moment in such diseases."

Dr. GEO. BEN JOHNSTON, Professor of Gynecology and Abdominal Surgery in the Medical College of Virginia, Richmond: "BUFFALO LITHIA WATER, in my opinion, has a larger range of usefulness than any other mineral water. Among the numerous conditions to which I have applied it with good results may be mentioned Typhoid Fever. In this disease I have found it to serve an excellent purpose in the way of promoting the free action of the kidneys; thus materially aiding in the elimination of deleterious matter. It has also seemed to retard wasting, and has preserved a moist condition of the tongue and buccal mucous membrane. In addition, those using it largely have appeared to suffer less from the ordinary nervous symptoms incident to profound poisoning."

Additional Testimony Upon Request.

Proprietor, BUFFALO LITHIA SPRINGS, Virginia.

Digitized by Google

"The Best Yet!

JUST WHAT WE DOCTORS HAVE BEEN AFTER"

"A non-poisonous germicide as reliable as mercury bichloride. ALPHOZONE is a new chemical---an organic peroxide---and is considerably more potent as a germicide than any other similar product. Promptly active in solutions of 1-1000 to 1-5000. It is easily soluble, and when dissolved is ready for use; with others you have to wait several hours for the germicidal power to develop. And Alphozone is not mixed with any other substance--it is all Alphozone--a fluffy, white crystalline powder. There are many other good things about it. It is permanent--does not deteriorate in the dry form. It has a high melting point and is not affected by summer temperatures. It has no disagreeable taste or odor. It is non-corrosive, so can be used for sterilizing surgical instruments. It is adapted to any external or internal use. For the sake of convenience it is also put up in 2 grain tablets. Beyond a doubt the physician's ideal is realized in Alphozone, and its makers, Frederick Stearns & Co. of Detroit, will send a sample and literature free to any physician on request."

Digitized by Google

SENT ON APPROVAL
TO RESPONSIBLE PEOPLE

Laughlin
Fountain Pen

Guaranteed Finest Grade 14k.
SOLID GOLD PEN

To test the merits of
The Texas Medical News
as an advertising medium
we offer your choice of

These Two Popular Styles For Only $1.00
Postpaid to any Address.

(By registered mail 8 cents extra.)

Holder is made of finest quality hard rubber, in four simple parts, fitted with very highest grade, large size 14k. gold pen, any flexibility desired—ink feeding device perfect.

Either style—**Richly Gold Mounted** for presentation purposes, $1.00 extra.

Grand Special Offer

You may try the pen a week, if you do not find it as represented, fully as fine a value as you can secure for three times the price in any other makes, if not entirely satisfactory in every respect, return it and *we will send you $1.10 for it, the extra 10c. is for your trouble in writing us and to show our confidence in the Laughlin Pen*—(Not one customer in 6000 have asked for their money back.)

Illustration on left is full size of Ladies' style; on right, Gentlemen's style.

Lay this Paper Down and Write NOW

Safety Pocket Pen Holder sent free of charge with each Pen.

ADDRESS

Laughlin Mfg. Co.
143 Griswold St., DETROIT, MICH.

K&O DOUCHE FOR THE APPLICATION OF GLYCO-THYMOLINE TO THE NASAL CAVITIES

GLYCO-THYMOLINE
FOR
CATARRHAL CONDITIONS

Nasal, Throat
Intestinal
Stomach, Rectal
and Utero-Vaginal

KRESS & OWEN COMPANY
210 FULTON STREET NEW YORK

Digitized by Google

Alphabetical List of Advertisers in the Texas Medical News for April.

	PAGE
Abbott Alkaloidal Co., Ravenswood Station, Chicago	xxiii
Angier Chemical Company, Boston, Mass,	xiii
Animal Therapy Co., Joseph R. Hawley, Chicago, Illinois	xxvii
Antikamnia Chemical Co., St. Louis, Mo.	xviii
Alexander, Dr. H. M., Company, Marietta, Pennsylvania	xix
Arlington Chemical Co., Yonkers, N. Y.	vii
Avenue Hotel, Austin, Texas	xiii
Barrett, Mrs. E. M., School for Feeble Minded, Austin, Texas	xx
Battle & Co., Chemists, St. Louis, Mo.	ii
Blythe, Dr. W. H., Mt. Pleasant, Texas	
Bovinine Company, New York	v
Breitenbach, M. J., Co., New York, N. Y.	xiv
Brush, Oliver, Electrician, Austin, Tex.	xxix
Business Chances	xxviii
Capital Book Store, Austin, Texas	xiii
Cary, Dr. Edward H., Dallas, Texas	xxix
Chicago Policlinic and Hospital, Chicago.	xx
Cincinnati Sanitarium, Cincinnati, Ohio.	iv
Cornick, Dr. Boyd, San Angelo, Texas	xxix
Crittenton, Chas. & Co., New York	i
Cuban Cigar Factory, Austin, Texas	xxviii
Daniel, John B., Atlanta, Ga	iv
Dad Chemical Company, New York	xviii
Davis, Sol, Cigars, Austin, Texas	xliv
Denver Chemical Manufacturing Company, New York, N. Y.	iii
Driskill Hotel, Austin, Texas	xiv
Endicott Hotel, N. Y.	xlvi
Eureka Nebulizer, Chicago, Illinois.	xix
Fairchild Brothers & Foster, New York, N. Y.	1st Cover Page.
Fellows Mfg. Co , New York, N. Y.	3rd Cover Page.
Flavell, G. W., & Brother, Philadelphia, Pa	viii
Gardner-Barada Chem. Co., St. Louis, Mo	xl
Gilcreest, Dr. J. E., Gainesville, Texas.	xxix
Goode, Thomas F., Buffalo Lithia Springs, Virginia	ix
Grace & Greenwood, Drs., Seguin, Tex.	xxix
Greenberg, S., Optician, Austin, Texas	xliv
Hart, E. J. & Co., Limited, Manufacturing Chemists, New Orleans, La.	xxiv
Hall Capsule Company, Cincinnati, O.	xxi
Hancock Hotel, Austin, Texas	xlii
Hardie, A. F., Dry Goods and Clothing, Austin, Texas	xliii
Harper, Dr. W. A., Austin, Texas	xxxi
Harvey, G.F. & Co., Manufacturing Chemists, Saratoga Springs, N. Y.	xxii
H. & T. C. R. R., M. L. Robbins, G. P. A., Houston, Texas	xxxii
Hospital Supply Co., Instruments, New York, N. Y.	xxxi
Hotel Driskill, Austin, Texas	xiv
Illinois Medical College, Chicago, Ill.	xx
Iron Mountain R. R., J. C. Lewis, T. P. A., Austin, Texas	xxxv
I. & G. N. R.R., P. J. Lawless, T. A., Austin, Texas	xxxix
Katharmon Chem. Co., St. Louis, Mo.	vi
Kress & Owen Company, New York.	xiii
Lambert Pharm. Co., St. Louis, Mo.	xvi
Laughlin Manfg Co., Detroit, Mich.	xi
Maplewood Sanatorium, Lebanon, Ohio.	xviii
Marchand, Charles, New York. N. Y.	xvi
Mariani & Company, New York, N. Y.	vii
McIntosh Battery Co., Chicago, Ill.	xxiii
Medical Department Fort Worth University, Fort Worth, Texas	xxxvii
Medical Department University of Texas, Galveston, Texas	xxxiv
Mellin's Food Company, Boston, Mass.	xvii
Mellier Drug Company, St. Louis, Mo.	xi
Moody, Dr, G.H , San Antonio Sanitarium for Insane	xxxvii
Naphey & Co., Warren, Penn	xxxvii
N. Y. School Physical Therapeutics	xxvii
New York Post-Graduate Medical School and Hospital, New York, N. Y.	xxxiii
Nixon's Commercial College, Austin, Tex.	xxxi
Northwestern University Medical Schoo], Chicago, Ill.	xxxvi
Oakland Chemical Co.. New York, N. Y.	viii
Od Chemical Company, New York, N. Y.	vii
Ottomar Carliczek Co., Electrical Operators, Chicago, Ill.	xxxiii
Parke, Davis & Company, Detroit, Michigan	4th Cover Page.
Parmele, Chas. Roome Company, New York, N. Y.	2nd Cover Page.
Patterson, G. W., Livery, Austin, Texas.	xliv
Peacock Chemical Co., St. Louis, Mo.	vi
Post-Graduate Medical School, Chicago, Illinois	xxv
Pettey, Dr. George E., Memphis, Tenn	xxviii
Purdue Frederick Company, New York.	i
Reuss & Reuss, Drs., Cuero, Texas	xxix
Rio Chemical Company, New York	vii
Risse, Emil, Photographer, Austin, Texas	xliv
Royal Baking Powder Co., New York	xvii
Rutledge Chemical Company, Ft. Worth, Texas	xxx
Santa Fe R. R., W. S. Keenan, G. P. A., Galveston, Texas	xxxv
Scarbrough & Hicks, Clothing, Austin, Texas	xli
Shelmire, Dr. J. B., Dallas, Texas	xxix
Smith, Martin H., New York	xxxix
Smith, Dr. M. M., Austin, Texas	xxix
Stearns, Frederick, & Co., Detroit, Mich.	x
Steiner, Dr. Ralph, Austin, Texas	xxxi
Sultan Drug Company, St. Louis, Mo.	xxvii
Torbett, Dr. J. Walter, Marlin, Texas,	xxix
Troy Laundry. Phil. Bosche, Austin, Texas	xlii
Von Boeckmann-Jones Company, Austin, Texas	xxviii
Wabash R. R., W. F. Conner, S. W. P. A., Dallas, Texas	xxxii
Wagner, R. V., & Co., Chicago. Illinois	xxxviii
Waite & Bartlett Mfg. Co., Electrical Apparatus, New York	xxvi
Walcott, Dr. H. G., Dallas, Texas	xxix
Wayne Elixir Company, Cincinnati, O.	xxi
Wheeler, T. B.. Montreal, P. Q. Canada	xx
Wright & Robinson, Furnishings, Austin, Texas	xliv
Wylie, Charles, Manufacturing Chemists, New York	2nd Cover Page.

Digitized by Google

FIVE POINTS OF EMPHASIS

FIRST

ANGIER'S PETROLEUM EMULSION is an odorless and practically tasteless combination of purified Petroleum with hypophosphites. It has been prescribed by the medical profession for nearly twenty years.

SECOND

ANGIER'S PETROLEUM EMULSION is particularly indicated in the treatment of Bronchial, Pulmonary and Intestinal diseases. In ALL wasting diseases its value is undisputed.

THIRD

ANGIER'S PETROLEUM EMULSION, by its soothing, healing and antiseptic action, promptly controls the cough of Bronchitis and Phthisis, and the congestion and inflammation of the upper air passages.

FOURTH

ANGIER'S PETROLEUM EMULSION has a marked effect upon nutrition. Appetite returns, patients digest and assimilate food more perfectly, and there is a corresponding gain in weight and strength.

FIFTH

ANGIER'S PETROLEUM EMULSION may be prescribed with confidence for children and patients having sensitive and delicate stomachs. It does not disturb appetite or digestion. It assists them.

ANGIER CHEMICAL CO., BOSTON, MASS.

Digitized by Google

HEREDITARY BLOOD

or blood tainted with syphilitic virus, tubercular diatheses transmitted through the blood, predisposition to Carcinomatous blood, Scrofulous diatheses are all cases continually met with. If the blood can be maintained at the proper standard, the predisposition to the so-called hereditary conditions will disappear. Allow the blood to become poor in quality and immediately family characteristics of disease and degeneracy appear. New blood, rich blood, healthy blood will keep the body pure and less liable to be attacked by the insidious foes which devastate entire families.

Pepto-Mangan ("Gude")

if given in incipient tuberculosis and all wasting diseases, will build up the system by building up the condition of the blood. The patient gains in weight and strength and the body is better able to ward off the impending disease.

Pepto-Mangan ("Gude") is ready for quick absorption and rapid infusion into the circulating fluid and is consequently of marked and certain value in all forms of

Anæmia, Chlorosis, Bright's Disease, Rachitis, Neurasthenia, etc.

To assure proper filling of prescriptions, order Pepto-Mangan ("Gude") in original bottles containing ℥xi. *It's Never sold in bulk.*

M. J. BREITENBACH COMPANY,

Laboratory, Leipzig, Germany.

53 Warren Street, NEW YORK.

SAMPLES AND LITERATURE UPON APPLICATION.

Digitized by Google

GASTRIC "GONENESS"

or that indescribable sensation of empty vacuity so frequently complained of by the chronic dyspeptic, is usually prevented or relieved by the regular use of

Lactopeptine Tablets

after meals. Physicians who may desire to submit these palatable pineapple flavored tablets to careful trial may obtain a liberal sample by addressing The N. Y. Pharmacal Ass'n Yonkers, N. Y.

DOSE: 2 to 4

ALL THE SALICYLIC ACID IN TONGALINE IS MADE FROM THE PUREST NATURAL OIL OF WINTERGREEN

Tongaline

POSSESSES

THE ANTISPASMODIC AND SEDATIVE ACTION OF CIMICIFUGA

THE CATHARTIC AND DIURETIC ACTION OF COLCHICINE

THE DIAPHORETIC ACTION OF PILOCARPINE

THE ANTI-RHEUMATIC AND ANTISEPTIC ACTION OF SALICYLIC ACID

RHEUMATISM
NEURALGIA
GRIPPE
GOUT
SCIATICA
LUMBAGO

TONGALINE LIQUID
TONGALINE TABLETS
TONGALINE & LITHIA TABLETS
TONGALINE & QUININE TABLETS

(WRITE FOR SAMPLES)

MELLIER DRUG COMPANY, ST. LOUIS.

Digitized by Google

Listerine

A Non-toxic, Non-irritant, Non-escharotic Antiseptic.

Absolutely Safe, Agreeable and Convenient.

Listerine is a well-proven antiseptic agent—an antizymotic—especially useful in the management of catarrhal conditions of the mucous membrane, adapted to internal use, and to make and maintain surgically clean—aseptic—all parts of the human body, whether by spray, injection, irrigation, atomization, inhalation, or simple local application.

For diseases of the uric acid diathesis: **Lambert's Lithiated Hydrangea**

A remedy of acknowledged value in the treatment of all diseases of the urinary system and of especial utility in the train of evil effects arising from a uric acid diathesis. A pamphlet of "Clippings" of editorials on this subject may be had by addressing:

LAMBERT PHARMACAL CO., St. Louis, U.S.A.

Be assured of genuine Listerine by purchasing an original package.

Hydrozone

Which yields thirty times its volume of "nascent oxygen" near to the condition of "ozone," is daily proving to physicians, in some new way, its wonderful efficacy in *stubborn cases* of ***Eczema, Psoriasis, Salt Rheum, Itch, Barber's Itch, Erysipelas, Ivy Poisoning, Ringworm, Herpes Zoster or Zona, etc. Acne, Pimples on Face*** are cleared up and the pores healed by **HYDROZONE** and **GLYCOZONE** in a way that is magical. Try this treatment; results will please you.

Full method of treatment in my book, "The Therapeutical Applications of Hydrozone and Glycozone"; Seventeenth Edition, 332 pages. Sent free to physicians on request.

Prepared only by

Charles Marchand

Chemist and Graduate of the "Ecole Centrale des Arts et Manufactures de Paris" (France)

57-59 Prince Street, New York

Digitized by Google

THE TEXAS MEDICAL NEWS.

A JOURNAL OF MEDICINE, SURGERY AND HYGIENE.

Devoted to the interests of the Medical Profession of Texas and the Southwest.

Published monthly at Austin, by THE TEXAS MEDICAL NEWS PUBLISHING COMPANY. Subscription, $1.00 a year, in advance.

MATTHEW M. SMITH, M. D., Managing Editor.
JAMES M. LOVING, M. D., Assistant Editor.

ASSOCIATE EDITORS.

S. O. RED, M. D., Houston,
J. W. McLAUGHLIN, M. D., Galveston,
A. M. ELMORE, M. D., Dallas,
R. W. KNOX, M. D., Houston,
H. A. BARR, M. D., Beaumont,
T. J. BENNETT, M. D., Austin,
E. D. CAPPS, M. D., Fort Worth,
G. B. FOSCUE, M. D., Waco,
WM. E. LUTER, M. D., San Antonio,
A. C. SCOTT, M. D., Temple.

VOL. XIII.] AUSTIN, TEXAS, APRIL, 1904. [No. 6.

Original Articles.

CONTRIBUTED EXCLUSIVELY TO THIS JOURNAL.

The Management do not hold themselves responsible for the views of their correspondents.

Technic of Ether Administration Using the Open Method.*

BY B. F. STEVENS, M. D., EL PASO, TEXAS.
Ex-Resident Physician, Palmyra Springs Sanitarium.

In attempting to administer ether with the ordinary Esmarch mask, as introduced by L. H. Prince in Chicago (*Chicago Medical Recorder,* May, 1897), in this altitute (3700 feet), I found that it was impossible to concentrate the vapor sufficiently to induce narcosis, so at the suggestion of Dr. E. J. Mellish I tried the mask devised by LePlace of Philadelphia. This mask is really a modification of the ordinary Esmarch. It consists of a wire gauze base, upon which the necessary layers of cotton gauze are placed, over this a metal cap on a hinge folds, leaving a space of perhaps an inch and a quarter. The metal cap has a slit, three-quarters of

*Revised from a paper read before the El Paso County Medical Society, October, 1903.

Digitized by Google

an inch wide, running lengthwise and crosswise, through which the ether is dropped on the gauze. The slit also allows sufficient air to pass through, so that the patient does not complain of being smothered, as is frequently the case with the closed inhalers, and yet it confines the vapor enough, so that the patient is easily put to sleep with a small amount of the anesthetic, in from ten to fifteen minutes. The gauze is of course changed with each anesthetic, while the mask, being all metal, may be boiled or scrubbed as desired. It is small, yet fits any face snugly, no matter how thin or how full. I have modified the mask somewhat, by having a small thumb-piece attached to the left side, to facilitate holding the mask in place when the patient struggles.

In connection with this inhaler I use the home-made drop bottle as suggested by Prince. This consists, as he describes it (*Milwaukee Medical Journal,* April, 1902), "Of a large mouthed bottle of about six-ounce capacity, the cork having two V's cut in opposite sides, one being free for the admission of the air. A piece of absorbent cotton, of such length as when twisted will reach nearly to the bottom of the bottle, is made into a fine wick, the other end protruding from the cork about an inch, may be twisted into any fineness desired, depending on the size of the drops required. The rapidity of the drops may be regulated by inclining the bottle, though it should never be tipped sufficiently to allow the ether to run from the air vent, neither should the bottle be shaken."

A strip of adhesive plaster pasted on the side of the bottle and marked in cubic centimeters, makes a convenient method of keeping track of the amount of anesthetic used. A drop bottle which works just as well and does not spoil the cork, may be made by putting a match in with the cork, so that it does not compress the cotton too firmly; the cotton being used as in the other bottle.

It is my custom to keep a record of each anesthetic as follows: Number of case; date; name; age; sex; preparation; condition; habits; urinalysis, before and after; kind of anesthetic used, amount to induce, and to maintain; time required to induce, length of anesthesia; vomiting, whether phrenic compression controls it or not; pulse and respiration; and the post-anesthetic condition. After these various headings are once put in table form, it is very little trouble to keep this record. A systematic urinalysis should be made in every case for albumen and sugar. A microscopic examination is of value, though not absolutely necessary.

Where possible the patient should be prepared several days before operation. Castor oil given in beer foam is a reliable cathar-

Digitized by Google

tic, and when given in this manner is not disagreeable. Where the cathartic is given a couple of days in advance, patients are not dehydrated, as it were, and therefore do not suffer so with thirst immediately after coming off the table. An enema of soap suds should be given a half hour before going on the table. The use of 500 c. c. of warm normal salt solution per rectum after long operations, or where there is much loss of blood, is also of decided value. This may be given while the patient is still on the table.

Before each ether anesthesia the hypodermic use of one hundredth of atropine sulphate is of value. It lessens the excessive secretion of mucus in the trachea, which is oftentimes so trouble-

**LaPlace Mask, opened ready to receive gauze—
Mellish tongue forceps.**

some. It is also a decided cardiac tonic. An eighth of morphine sulphate is also valuable in alcoholics and patients who are extremely nervous. It is almost unnecessary to say that patients should always be anesthetized in the recumbent position, yet I recall one case in the past year where a nervous patient wanted to be put asleep while sitting up in the wheel chair, and the anesthetizer attempted to do so, but the patient was finally induced to lie down.

In the vast majority of cases it is possible to anesthetize the patient right on the operating table, especially is this so where the anesthetizer has the entire confidence of his patient, which is almost absolutely essential, for a safe anesthetic. After patients are once asleep, it is almost impossible to transfer them to an-

Digitized by Google

other table without allowing them to awaken, when there is a struggle to again put them to sleep. The anesthetic should be stopped during the removal of the patient to the operating table, unless the anesthetizer is able to give his undivided attention to the anesthetic, and not do any of the lifting.

The patient's eyes should be protected by a large moist cotton compress and the face annointed with vaseline. It is not necessary to take the corneal reflex, this is a dangerous and barbarous custom, not infrequently causing sloughing of the cornea and severe conjunctivitis. The compress may be raised occasionally to observe the condition of the pupils. If they are contracted and immobile and the muscles relaxed, the patient is then ready for the surgeon. A contracted and mobile pupil usually indicates awakening from the anesthetic. A dilated and fixed pupil is a sign of extreme danger, when the anesthetic should be withdrawn at once. Some operations cause the pupils to dilate. Morphine or atropine do not affect the pupils in ether anesthesia.

The use of one-half dram of the oil of wintergreen or a like amount of a 50 per cent alcoholic solution of menthol on the gauze before beginning the other is of value. It anesthetizes the nasal mucous membrane to a certain extent, thus preventing coughing and gagging, while the pleasant odor gives the patient confidence and allows him to become used to the mask, before commencing with the ether. The mask is placed snugly on the patient's face, and he is asked to slowly count aloud and inhale the menthol for a few minutes. Then the ether is allowed to drop slowly on the gauze drop by drop. This prevents the smothering sensation which patients so often complain of. If retching or voming occur, they may frequently be controlled by steady pressure with the thumb on the left phrenic nerve, as it passes between the two heads of the sterno-cleido-mastoid muscle. This must be done at the very first sign of vomiting to be successfnl. Prince (*Chicago Medical Recorder,* May, 1897), was successful in 213 cases out of 225, in which he tried it. Pushing the anesthetic while the patient is vomiting is, to my mind, a pernicious practice, and should be avoided. Better turn the head to one side and keep the air passages free; use phrenic compression until vomiting ceases, and then go back to the anesthetic. In emergency work, where possible, the stomach should be washed out first before beginning the anesthetic, then there will be no danger of food becoming lodged in the trachea in vomiting.

Where there is excessive secretion of mucus, it should be carefully sponged out with gauze sponges, on long forceps, while the

Digitized by Google

tongue is held well forward. A suitable mouth gag may be made out of a hardwood lath, eight inches long, an inch and a quarter wide, by a quarter of an inch thick. This can be wedged in between the teeth and then turned on edge and the jaws thus forced apart, without much exertion or injury to the teeth. The tongue may then be pulled forward, by means of dry gauze, or with tongue forceps. Those of Mellish with two prongs shaped like a volcellum are reliable, and in the majority of cases will not do as much damage to the tongue as those which depend on pressure, to prevent the tongue from slipping. It is rarely that a forceps is needed by the skilled anesthetizer.

If for any reason the patient stops breathing, the head should be lowered at once, the tongue drawn well forward, and artificial

Mask with gauze in place, ready for use.

respiration resorted to at once, using Sylvester's method. Ochsner's suggestion, of first expelling all air in the chest to get rid of what vapor may be in the lungs, and then inflating the chest in the ordinary manner, is a good one. Dilation of the anal sphincter, and the application of a compress saturated with ammonia to the nose, are also of benefit. The hypodermic use of drugs in this condition is, to my mind, of little value. The posi-

Digitized by Google

tion of the tongue is an important point to be observed. The lower jaw should be held well forward during the entire administration of the anesthetic.

On the conclusion of operations lasting more than twenty-five minutes, it is well to wash out the patient's stomach with a hot solution of bicarbonate of soda, a dram to the quart, followed by hot normal salt solution. The stomach tube may be passed through the nose while the patient is still unconscious, the patient then put in the Trendelenburg position to prevent regurgitation of fluid into the trachea. This procedure lessens and to a large extent does away with the post-operative vomiting. The return fluid generally contains a quantity of mucus and bile, as well as a certain amount of ether. The patient is then transferred to a warm bed, with as little shaking up as possible; a nurse or physician remaining with him constantly until he awakens.

The amount of ether required for different patients varies, and can only be determined by the symptoms in each individual case. The open method probably requiring slightly more than the so-called closed methods. In one hundred cases of which I have kept accurate records, it took an average of 155 c. c. of ether to produce and maintain anesthesia lasting an average of sixty-five minutes. It took an average time of a little less than eleven minutes to induce narcosis. In a series of several thousand of Prince's he gave an average of 180 c. c. of ether to maintain anesthesia an average of forty-six minutes, after they had been put to sleep with chloroform. He used the ordinary Esmarch inhaler (*Chicago Medical Recorder,* May, 1897). In my forty chloroform anesthesias, it took an average of six and one-half minutes to induce narcosis, so there is really not a great difference in the time required to produce narcosis with either anesthetic. The ether should be taken from a fresh unopened can in order to avoid all unpleasant effects. It has been found that ether which has been exposed to the air or light, no matter if even for only a short time, will take longer to produce anesthesia, and there is more liability of vomiting and a longer period of excitement.

DELETERIOUS EFFECTS OF ETHER.

On Lungs.—Mikulicz reports (Report Thirtieth Annual German Medical Congress) 1007 laparotomies with a general anesthetic, 7.5 per cent of which were followed by pneumonia, with a mortality of 3.4 per cent; while in 273 laparotomies done under local anesthesia, there followed 12.8 per cent cases of pneumonia, with a mortality of 4.8 per cent. Rumboll, of London, England (Mel-

Digitized by Google

lish, *Journal American Medical Association,* December 5, 1903), reports 1500 ether anesthesias with only one case of pneumonia, two of bronchitis and four of minor bronchial affections. In my hundred cases there occurred no pneumonia or bronchitis which might be said to be directly due to the anesthetic. One patient, a female age 35, developed pertussis on the second day after operation (celiotomy for a large ovarian cyst), which was followed in two weeks by a lobar pneumonia. This was surely in no way due to the anesthetic, as the period of incubation in pertussis is from seven to ten days. The patient recovered from both the operation and the pneumonia. The lowered temperature no doubt contributes to the production of a pneumonia or bronchitis, so that great care should be exercised in protecting the patient from being chilled while on the table.

On the Kidneys.—Carl Beck, of New York, reports finding albumen in 9 per cent of 300 cases, in which it was found after, and not before, the administration of ether. Korte found albumen in only 1 per cent of 600 cases: In my series I found albumen in only one case, and that was in a sclerotic man of 50. In the majority of cases the presence of post-operative albumen is due to a faulty technic or careless selection of cases.

Comparative Mortality.—Bouffleur reports his findings from the statistics of 500,000 ether and 1,000,000 chloroform anesthesias. In the former the rate was 1 to 16,768, while in the latter it was 1 to 3355. Gurlt's statistics, based on 156,815 war cases, give a mortality of 1 to 2899 for chloroform alone, while for chloroform and ether together it was 1 to 41,181. The statistics given at the Thirtieth Annual German Medical Congress at Berlin in 1901 were, for ether, 1 to 5000, and for chloroform, 1 to 2923. These figures are the highest I have ever seen for ether anesthesia, however. The figures of different reporters will vary somewhat unless many thousand cases are considered, but we may safely say that the mortality from ether is about 1 to 15,000, while with chloroform it is about 1 to 5000. A large number of the deaths from chloroform occur in the dentist's chair, and are never reported.

The Selection of the Anesthetic.—Ether is contra-indicated in a marked nephritis (though a mild grade is no more affected by ether than by chloroform), in asthma, marked arterio-sclerosis, pulmonary tuberculosis, and acute bronchial affections. In heart disorders, where a general anesthetic must be used, ether is perhaps the least harmful. It is much safer for indiscriminate use, the dose is much larger than with chloroform, the bad effects more readily noticed, it takes longer to kill, which it does by its effect

Digitized by Google

on the respiration. The difference in the size of the dose necessary to induce narcosis, and the fatal dose, is much greater than in chloroform, which primarily affects the heart. Treatment of impending death from chloroform is usually of no avail, while in ether anesthesia the heart generally continues to beat long after respiration has ceased. As Mayo expresses it: In death from ether, the patient at least has time to say good bye to his friends and the physicians, while with chloroform, death generally occurs immediately, and gives the physician no chance to protect himself. Deaths from ether on the operating table are rare, by using a minimum amount of anesthetic, proper preparation, and keeping the patient warm while on the operating table.

The advantages of the LaPlace mask for this climate are: That it confines the vapor enough to easily produce anesthesia without smothering the patient; it requires only a minimum amount of ether, which can be easily regulated drop by drop; it is compact and simple and easily cleaned; it may be used equally as well for chloroform as for ether.

Ureteral Calculus. A Case, Operation and Results.*

BY G. W. M'CALEB, M. D., GONZALES, TEXAS.

Mrs. D. F., a multipara, age 40 years, French. This patient was brought to my office on August 9, 1902, complaining of pains in the right iliac region, and at times extending from the liver down to the rectum.

History.—These attacks of pain began about five years previous, and had continued up to my consultation, and at irregular intervals the pain would become unbearable. The attacks of severe pains were becoming more frequent; at times were so severe that she was compelled to resort to the use of morphine to obtain relief. She had not become addicted to the use of the drug, as it always produced nausea and vomiting and she dreaded these after effects. There had never been an attack of hematuria, neither was she aware of ever having passed a stone from the bladder. She was never entirely free from pain, but, during the interim of the severe paroxysm, would suffer with constant uneasiness in the right iliac region. When the exacerbations of pain came on, she would usually fall where she was standing. The paroxysms would generally last from one-half to one hour. The bowels were ir-

*Read before the Austin District Medical Society.

Digitized by Google

regular, appetite poor, and she was unable to sleep properly on account of the suffering. She was greatly emaciated, and the facial expression indicated suffering. She had been to three hospitals for treatment without obtaining relief from her trouble. She had never been operated on, and the treatment had always been medicinal.

The first examination was made without an anesthetic, and no diagnosis was made. A specimen of the urine having been obtained, the patient was instructed to return on the following day for a more thorough examination and for an opinion of the case. After the patient left the office, a microscopical and chemical examination of the urine was made, but, as it was normal in reaction and contained neither casts, crystals, nor pus corpuscles, the examination gave only negative results and failed to shed any light upon the nature of the affliction.

The patient did not return until August 19th, ten days later, as she had suffered from a very severe exacerbation of the pain in the interval which prevented her return sooner.

She was then anesthetized with chloroform and examined. The liver and spleen were then enlarged and the gall bladder could not with certainty be mapped out. The kidneys were in a natural position, and seemed to be about normal in size. The vagina, uterus, tubes, and ovaries were physiologically healthy. The rectum appeared to be quite free from disease. But, pursuing the examination further, with the right index finger in the vagina and the left hand making deep counter pressure over the right iliac region, a tumor was detected in the floor of the pelvis just anterior to the right broad ligament which, on account of its firmness and the direction of its axis, was diagnosed a ureteral calculus. Cystoscopic examination was not made. But, as the urine was normal and as the patient had never complained of pains in the opposite side, the left ureter was considered healthy and catheterization was deemed unnecessary.

The patient was placed on preparatory treatment, consisting of a mercurial purge followed by quinine for several days, and August 27th set for the operation.

Operation.—On the 27th, the patient was placed on operating table on her back with legs flexed, as for perineorrhaphy. Chloroform was the anesthetic administered. The external genitalia were thoroughly cleansed, and the vagina scrubbed with soap and sterilized water. The cervical canal was cleansed and packed with gauze to prevent soiling the operative wound by its secretions, and the vagina again cleansed. The bladder was emptied by cather-

Digitized by Google

terization. The posterior vaginal wall was retracted, and an incision made through the vaginal wall at the right antero-lateral juncture, beginning at the vagina roof and extending about one and one-half inches in length, parallel with the axis of the vagina and about centrally over the tumor. The cellular tissue was separated with the handle of the scalpel, and the ureter located near its insertion into the bladder. The ureter was taken as a guide, and the incision extended to the location of the stone. There had been considerable pericellulitis at the location of the calculus and the tissues were matted and indurated, but there was no active inflammation at the time of operating. When the muscular wall of the ureter was reached, a longitudinal incision was made through its wall parallel to its axis and extending from slightly above the center of the calculus to a little beyond its vesical extremity. The stone was then loosened from its moorings, where it had become firmly embedded, and removed with a pair of forceps. The calculus weighed eight grains. Upon removing the calculus, about one ounce of urine flowed from the ureter above where it had been dammed back by the stone, blockading the caliber of the ureter. A ureteral catheter was then passed into the bladder and up to the kidney to make sure that no further obstruction existed to prevent the free flow of urine through the ureter. Finding the lumen of the ureter unobstructed, the ureteral incision was closed by two rows of interrupted Formalin catgut ligatures. The first row was passed through the muscular layers about one-quarter inch apart, avoiding the mucous coat. The second row was passed so as to coaptate the indurated cellular tissue, with each alternate suture including a portion of the muscular wall of the ureter to insure union between the ureter and the indurated cellular tissue again and to further guard against a leakage of urine through the ureteral incision. The wound was then packed with a strip of gauze, one end of which was brought through the incision in the vaginal wall to facilitate its removal and to favor drainage should leakage occur. The wound in the vaginal wall was closed except about five-eighths of an inch through which the gauze protruded. The vaginal wound was protected with gauze, and the packing removed from the cervical canal. The vagina was then packed with gauze. The packing was used for the purpose of supporting the incision in the ureter and thereby relieve tension on the sutures so far as possible, to facilitate drainage and to guard against infection. The packing was removed in twenty-four hours both from the vagina and the cellular tissue. As there was no indication of urine leakage, the

Digitized by Google

wound in the vaginal wall was completely closed, under antiseptic precautions, and the vagina again packed with gauze. The irrigation and packing were repeated every twenty-four hours for five days, but, as there had been no leakage of urine and the wound about healed, the irrigation and packing were discontinued.

The patient was free from pain on and after the operation, and made a complete and uneventful recovery without any elevation of temperature. She was permitted to sit up on and after the fifth day, and returned home on the tenth day after the operation. The appetite improved, and the patient gained in weight until she became robust and healthy. This case has been kept under observation and there has been no return of pain and she has continued in excellent health.

The subject of ureteral calculus is one of very great importance and worthy of earnest and careful consideration. The ureter is not the location where the stone forms, but the calculus has its origin in the pelvis of the kidney and migrates into the ureter, and, if too large for the caliber of the ureter, becomes lodged where it will produce a partial or complete obstruction to the flow of urine from the kidney to the bladder. There are three points in the ureter where the calculus will lodge by preference: at its renal extremity, in the floor of the pelvis, and at its cystic end where the ureter passes between the muscular wall of the bladder. All of these points can be reached by extra-peritoneal incision. When the calculus is located in the floor of the pelvis, it is much easier to reach in the female than in the male, as it can usually be removed by a vaginal incision.

The obstruction of the ureter by a calculus, damming the urine back on the kidney, is almost certain eventually to lead to the ultimate destruction of the physiological functioning of the corresponding kidney by absorption or disentegration. If the obstruction is complete, the urine will accumulate in the ureter, pelvis, and calices of the kidney until the pressure of the pent up urine equals that of the blood current, producing a hydronephrosis, and resulting in the complete or partial destruction by absorption of the secreting mechanism of the kidney. It may require years for the total destruction of the secreting cells. Should the urine become infected from any cause, the case becomes more serious and more certain to ultimately terminate by death of the patient. The pressure may produce rupture of some portion of the urinary tract above the point of obstruction, the urine escaping into the retroperitoneal tissue or into the peritoneal cavity, or even into some of the adjacent organs. If the obstruction is incomplete, as

Digitized by Google

in the case here reported, the hydronephrosis will be intermittent and may be temporarily relieved, completely or partially by irregular paroxysms of pain manifesting the symptoms of renal colic, and may not produce serious damage to the functional activity of the corresponding kidney for months or even years, depending on the degree of obstruction and whether the urine remains sterile or becomes infected.

A diagnosis of ureteral calculus can not be made from the symptoms. We will have to arrive at a diagnosis by manual examination or by catheterization of the ureter. One author says "that the symptoms of renal colic disappears as the calculus is rendered immobile in the ureter," while another one says "these attacks are intermittent, and recur at variable intervals as long as the stone remains." In the case here reported, although the calculus was "rendered immobile in the ureter" and had been firmly fixed in its location for an indeterminable period of time, the symptoms of renal colic did not disappear, but the attacks of severe pain were "intermittent and recurred at variable intervals as long as the stone remained."

The *American Text-Book of Surgery* says: "It is probably wise not to attempt to suture the wound in the ureter, but trust to its spontaneous closure." For, should the wound close spontaneously, it would require a longer time and unnecessarily prolong the period of canvalescence. The wound will not close spontaneously or otherwise unless the urine is rendered acid in reaction. If ammoniacal decomposition of the urine is taking place in the kidney, the edges of the incision will become covered with phosphatic incrustations which will prevent healing of the wound and result in a permanent fistula. The fistula will necessitate a secondary operation for its closure, or the patient might possibly die from urinary infiltration and auto-infection resulting from absorption of the toxines of decomposition. If the urgency of the case will permit, an attempt should be made to render the urine acid in reaction before operating, and the patient placed in the best possible condition for a rapid convalescence.

Remarks on Ureteral Anomalies.

BYRON ROBINSON, B. S., M. D., CHICAGO.

I. NUMBER.

Absence of ureter in connection with absence of kidney. One kidney and one ureter being present, a kidney not functionating

Digitized by Google

will atrophy and vice versa. I know of one specimen where one ureter and one kidney were present. One-half of the trigone was absent. Another specimen showed one kidney and one ureter with a piece of tissue about the size of a bean for the other kidney, which had no ureter.

Multiple.—Multiple ureters, partial or complete are perhaps as common as 4 per cent. The ureters may be unilaterally or bilaterally, partially or completely duplicated. Unilateral duplicity of ureters is liable to be shared bilaterally. Partially duplicate ureters converge, join at any point from the distal renal pole to the vesical trigone. Duplicate ureters are said to appear more frequently on the left, which I have not been able to confirm.

Bostroem reported ten cases of complete bilateral ureteral duplication. So far as I am able to observe, complete bilateral duplicity has completely separated calices and pelvis; I am unable to state this in cases of partial bilateral duplicity. In complete duplicate ureters, the distal calices and pelves are generally the larger. In ureteral duplicity, the proximal ureter is the longer. During the past two years I have seen thirteen cases of complete duplicate ureters (with three additional subjects with bilateral duplicate in horseshoe kidney). Two cases possessed complete bilateral ureteral duplicity. The eight other subjects of complete duplicate ureters were now left and now right. Partially unilateral ureteral duplicity is a common affair. All complete duplicate ureters have separate pelves and calices. The renal parenchyma coalesced, but the pelves were separated by a wedge of connective and renal tissue. In duplicate ureters, the ureteral pelves lie generally in the same plane. Exceptionally one ureteral pelvis projects unusually dorsalward or ventroward. In complete bilateral ureteral duplicity, the location and distance of the two vesical orifices of the opposite sides may not agree or correspond. The orifices vary, but mainly empty in direct axis. The distal ureteral orifices are important in practice on account of ureteral catheterization and surgical intervention.

II. COURSE OF ANOMALOUS URETERS.

The complete duplicate ureters course in close proximity to each other in such a manner that the proximal ureter crosses dorsal to the distal ureter. This rule was announced by Karl Weigert in 1877. Von Bostroem reported thiry cases of complete ureteral duplication with twenty-six ureteral crossings and four with incomplete or indefinite crossings. Ludwig Geerdts collected eleven cases of complete ureteral duplication from literature with partially accurate description in which eight presented perfect ure-

Digitized by Google

teral crossing. Ten of our cases of complete duplicate ureters presented the proximal ureter crossing dorsal to the distal ureter. Henry B. Decherd reports a case of complete bilaterally duplicate ureters with bilateral ureteral crossing, with vesical orifice of the proximal ureters having their exit medianward and distalward from the vesical orifices of the distal ureter. A. H. Gould reports two subjects of bilateral ureteral duplicity. It is evident from his description that ureteral crossing occurred especially in the second

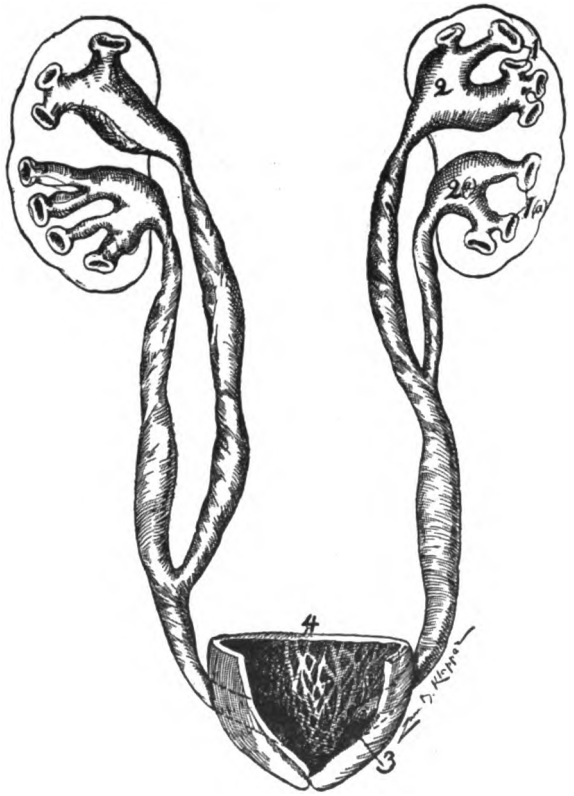


Figure 1.

case because he mentions that, in the second case, the vesical orifices of the proximal ureters open median and distal to those of the distal ureter; hence crossing is a physical necessity. In the first case, he also mentions the fact that of two vesical orifices having their exit distalward and medianward of those of the other ureters.

The Location of Ureteral Crossing.—In complete duplicate ureteral duplicity in our thirteen cases, the two ureteral crossings were located on the same level; however, that was in the pelvis.

Digitized by Google

The proximal ureter lies: first, medianward from the distal ureter; second, the proximal ureter crosses dorsal to the distal ureter; third, the vesical orifice of the proximal ureter has its exit distalward and medianward to that of the distal ureter. The complete duplicate ureters lie closely adjacent in the lesser pelvis. The crossings of complete bilateral duplicate ureters lie practically on the same level on opposite sides. Partially complete duplicate bilateral ureters do not converge at the same level. The

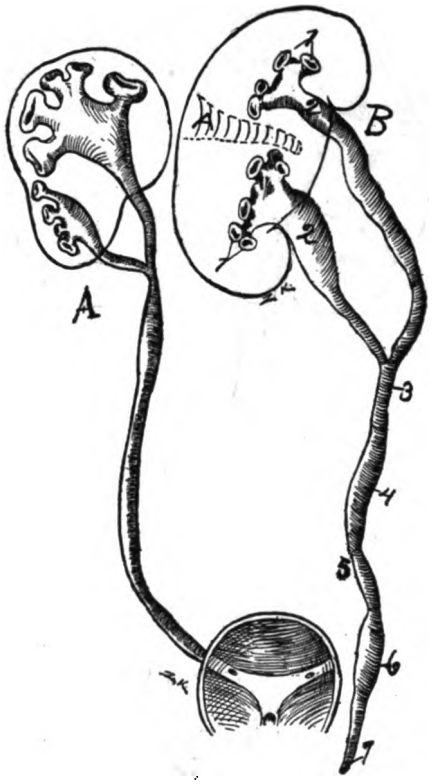


Figure 2.

vesical orifices of the ureters at present are of supreme importance both as to ureteral catheterization and surgical intervention.

Fig. 1. Bilateral partially duplicate ureters with extensive dilatation due to ureteral obstruction. 1 proximal calyces; 2 proximal pelvis; 1a distal calices; 2a distal pelvis; 4 bladder mucosa, showing prominent tubercular condition; 3 the widely patent distal ureteral orifice, calices, pelvis, ureter and bladder one continuous patent channel. The ureters do not bifurcate at the same level. This specimen was presented to me by Dr. A. M. Stober.

Fig. 2. Two anomalous ureters from different subjects. (A)

Digitized by Google

On the left is a partially duplicate ureter. Man aged 39. It was presented to me by Dr. H. G. Harris. The distal pelvis is the smaller. Ureteral constrictions and dilatations are as usual. No wedge of fibrorenal substances exists between the pelvis. (B) on the right is a partially duplicate ureter. The renal wedge (A) was distinct lying between the ureteral pelves. As is usual, the distal pelves and calices are the larger. 1. calices; 2 pelves; 3 proximal ureteral isthmus; 4 lumbar spindle; 5 middle isthmus;

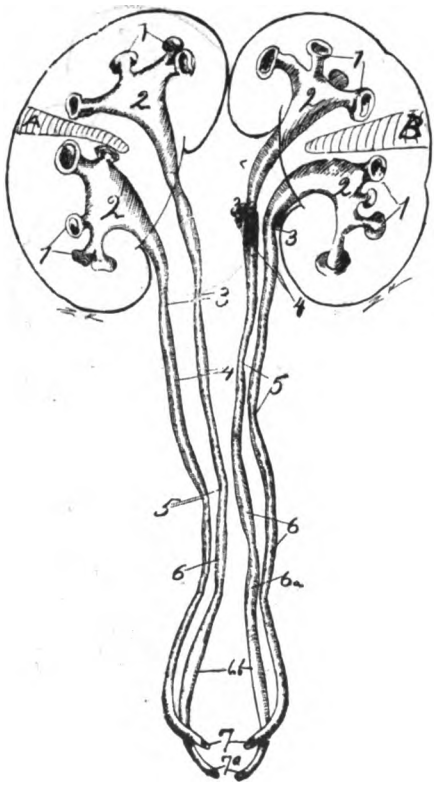


Figure 3.

6 pelvis spindle; 7 distal ureteral constriction. This specimen was presented to me by Dr. Duchett.

Fig. 3. Bilaterally duplicate ureters. Observe that the ureters cross in such a manner that the vesical orifice of the proximal ureter (7a) is located medianward and distalward to that of the distal (7). Note the wedge of fibro-renal tissue (A and B). The calices and pelvis are malformed. The ureters are relatively small in caliber. Ureteral constructions (3, 5 and 7) and dilatations (2, 4 and 6) are as usual. This specimen was presented to me by Dr. William Fuller.

Digitized by Google

Society Notes.

Program of the State Medical Association.

Preliminary program of the Thirty-sixth Meeting of the State Medical Association of Texas, to be held in Austin, Texas, April 26, 27, 28 and 29, 1904. Place of meeting, the Auditorium of the University of Texas:

COMMITTEES.

Committee on Arrangements.—T. J. Bennett, Chairman; Ralph Steiner.

Finance Committee.—M. M. Smith, Chairman.

Committee on Transportation.—Homer Hill, Chairman.

Invitation Committee.—F. E. Daniel, J. S. Wooten, Geo. R. Tabor.

Committee on Hotels.—J. S. Wooten, Chairman.

Committee on Entertainment.—B. M. Worsham, Chairman.

Reception Committee.—S. E. Hudson, Chairman.

Committee on Exhibits.—W. N. Watt, Chairman.

HOTEL RATES.

Driskill, $2.50 to $5.00 per day. Special rates when two occupy the same room.

Avenue Hotel, $2.00 per day.

Hotel Sutor, European Plan, $1.00 per day for room; 50 cents per meal.

Hancock Hotel, $2.00 per day.

Boarding house rates furnished by Information Committee, Dr. J. M. Loving, Secretary.

RAILROAD RATES.

Regular convention rates of one fare plus 10 per cent secured on all railroads. Tickets will be on sale 20th, 24th and 25th of April, good to return until May 1st.

TUESDAY, APRIL 26TH, 10 A. M.

Convention called to order by Chairman of the Committee on Arrangements, T. J. Bennett, Austin, at University Auditorium.

Invocation, Rev. S. H. Werlein, Austin.

Welcome, Mayor R. E. White.

Welcome on behalf of the citizens of Austin, Rev. R. J. Briggs,

Digitized by Google

Welcome on behalf of the medical profession, F. E. Daniel, Austin.

Welcome on behalf of the University of Texas, President Wm. L. Prather.

Response, Frank Paschal, San Antonio, President State Medical Association.

TUESDAY, APRIL 26TH, 11 A. M. TO 12:30 P. M.

Section on General Medicine.

Walter Shropshire, Yoakum, Chairman.
G. B. McKnight, Mansfield, Secretary.

"Malarial Fever and Its Expense to the People of Texas," Albert Woldert, Tyler.

"Report of a Case of Malarial Cystitis, with Demonstration of Parasites in the Blood Cells Found in the Urine," Robt. Westphal, Yorktown.

"How Insects Carry Disease," Major Chas. F. Mason, U. S. A., San Antonio.

"Some Observations on Malaria," J. T. Fitzsimon, Castroville.

"The Medical Side of Appendicitis," R. T. Morris, Houston.

"The Signs and Pathology of Pleural Lesions," A. E. Thayer, Galveston.

"A Flexible Bath Tub on the Bed, and Its Advantages," J. S. Lankford, San Antonio.

"Reflex Heart Troubles and the Necessity of Their Correct Diagnosis," G. L. Davidson, Wharton.

"The Advantages and Use of the Microscope in General Practice," J. W. McLaughlin, Galveston.

"Pneumonia in Our Penal Institutions," W. E. Fowler, Huntsville.

"Diabetes Mellitus," C. W. Letzerich, Sublime.

TUESDAY, APRIL 26TH, 5 P. M.

Section on Gynecology.

H. W. Crouse, El Paso, Chairman.
W. B. Russ, San Antonio, Secretary.

Chairman's Address.

"Report of a Case of Fecal Fistula, Abdominal and Vaginal," Geo. H. Lee, Galveston.

"Extra Uterine Pregnancy, with Report of Two Cases," W. J. Mathews, Austin.

"Report of Two Unusual Cases," J. F. Y. Paine, Galveston.

Digitized by Google

TUESDAY, APRIL 26TH, 8. P. M., UNIVERSITY AUDITORIUM.

Music, University of Texas Band.
President's Annual Address, Frank Paschal, San Antonio.
Music, University of Texas Band.
Annual Oration, H. A. Barr, Beaumont.
Musical concert and general inspection of the departments of the University.

WEDNESDAY, APRIL 27TH, 9 A. M.

Section on State Medicine and Public Hygiene.

E. E. Guinn, Jacksonville, Chairman.
A. L. Hathcock, Palestine, Secretary.

"Incipient Insanity, Its Diagnosis and Treatment," John Punton, Kansas City, Mo.
"The Relation of the Public School to the Medical Profession," Hon. Arthur Lefevre, Austin.
"Tuberculosis in Our Public Institutions," M. L. Graves, San Antonio.
"The Prophylaxis of Tuberculosis," W. S. Carter, Galveston.
"The Sanatorial Treatment of Tuberculosis," M. M. Smith, Austin.
"Prevention and Control of Malarial Fever," J. T. Moore, Galveston.

WEDNESDAY, APRIL 26TH, 3:30 P. M.

Section on Medical Jurisprudence.

G. H. Moody, San Antonio, Chairman.

Chairman's Address.
"A Consideration of the Commoner Alcoholic Phycoses," Joseph Collins, New York City.
"The Cause and Prevention of Rape—Sadism in the Negro," F. E. Daniel, Austin.
"Physiological Therapeutics in the Treatment of the Insane," J. S. Turner, Terrell.
"The Importance of Ample Provision and Proper Treatment for the Insane," J. R. Nichols, Terrell.
"A Case of Paranoia," M. L. Graves, San Antonio.
"Some Aspects of Legislation in the Light of Modern Medical Science," H. L. Hilgartner, Austin.
"Degeneration—A Study in Social Pathology," J. S. Wooten, Austin.

Digitized by Google

WEDNESDAY, APRIL 27TH, 3:30 P. M.

Section on Dermatology.

J. B. York, Houston, Chairman.
T. J. Pier, Brenham, Secretary.

Chairman's Address, "Why Do Not the Physicians of Texas, Who Are So Often Solicited, Respond."

"Syphilis and Civilization," W. B. Allen, Marlin.

"Sexual Neurasthenia," H. B. Coombs, Bastrop.

"Urticaria," Aug. D. Ferguson, Estacado.

"Tinea," J. E. Wilson, Bastrop.

"Treatment of Carbuncle," M. M. Pool, El Campo.

"Venereal Disease and Preventive Medicine," W. F. West, Waxahachie.

"The Use of Anti-Streptococcic Serum in the Treatment of Mixed Infections of Tuberculosis and Streptococci," Otto Ehlinger, La Grange.

"Painless Treatment of the Whisky and Drug Habit," M. K. Lott, Cameron.

"Creosote in the Treatment of Pneumonia," I. L. Van Zandt, Fort Worth.

WEDNESDAY, APRIL 27TH, 4 TO 6 P. M.

Reception to the members of the Association and their ladies by Governor and Mrs. S. W. T. Lanham at the Mansion.

WEDNESDAY, APRIL 27TH, 6 TO 8 P. M.

Reception to the profession and ladies at the Seton Infirmary by the Sisters of Charity.

WEDNESDAY, APRIL 27TH, 8 P. M.

Section on Medicine.—Special Session.

Lecture, "Yellow Fever and Its Conveyance," Surgeon H. R. Carter, United States Public Health and Marine Hospital Service.

"An Outbreak of Yellow Fever in DeWitt county," J. H. Reuss, Cuero.

"The Laredo Yellow Fever Epidemic," R. L. Dinwiddie, San Antonio.

"Associated Thought and Organization," S. R. Burroughs, Buffalo.

Digitized by Google

THURSDAY, APRIL 28TH, 9 A. M.

Section on Surgery.

Bacon Saunders, Fort Worth, Chairman.
J. D. Osborne, Cleburne, Secretary.

Chairman's Address, "The Early Routine Extirpation of all Neoplasms."

"Obstructions in Ductus Communis Choledochus," A. H. Cordier, Kansas City, Mo.

"Congenital Defects of the Hip Joint and the Modern Method of Treatment," P. Henry Fitzhugh, New York, N. Y.

"Tuberculosis of the Shoulder Joint, with Radical Operation for Its Removal," Wilmer L. Allison, San Antonio.

"Movable Kidney, with Report of a Case," J. E. Gilcreest, Gainesville.

"Gonorrheal Cystitis, Report of Cases," J. H. Shelmire, Dallas.

"Reflex Condition Complicating Floating Kidney, with Report of Unusual Case Relieved by Operation," J. M. Inge, Denton.

"The Advantage of the Ferguson Operation in Hernia," Joe Becton, Greenville.

"The Treatment of Extrophy of the Bladder—A Successful Case of Transplantation of the Ureters Into the Sigmoid Flexure, According to the Method of Mandyl," J. E. Thompson, Galveston.

"Traumatic Lumbago," S. C. Red, Houston.

"Treatment of Sprains of the Knee and Ankle Joint," J. T. Wilson, Sherman.

"A Simple Method of Intestinal Anastomosis, with Report of a Case of Gastro-Enterostomy," A. C. Scott, Temple.

"The Treatment of Club Foot," R. W. Knox, Houston.

"Some Remarks on the Operation for Hernia," T. J. Bennett, Austin.

"Tumors on the Breast, with Special Reference to Their Early Recongition and Treatment," M. Smith, Sulphur Springs.

THURSDAY, APRIL 28TH, 2 TO 2:30 P. M.

Section on Surgery.—continued.

"The Anatomy of the Case of the Thyroid Gland Illustrated by Casts and Specimens," Wm. Keiller, Galveston.

"Modelling Redressment Treatment of Club Foot (Lorenz Method), (Cases Exhibited Showing Result)," M. M. Smith, Austin.

"Amputation of the Hip Joint, with Report of Successful Case," W. J. Mathews, Austin.

Digitized by Google

THURSDAY, APRIL 28TH, 3:30 TO 6:30 P. M.

Section on Pathology.

Wm. Gammon, Galveston, Chairman.
J. J. Terrell, Galveston, Secretary.

Chairman's Address.

"Methods for Preparing Specimens to be Sent to Laboratories for Examination," H. C. Schaffer, Galveston.

"The Permeability of the Healthy Intestines to the Tubercle Bacilli," James J. Terrell, Galveston.

"Immunity," A. E. Thayer, Galveston.

"The Consumption and Elimination of Water in Moist and Dry Climates, with Special Reference to the Cause of Bright's Disease," W. S. Carter, Galveston.

THURSDAY, APRIL 28TH, 9 TO 12 P. M.

Grand ball and reception at the Driskill Hotel, tendered by the medical profession of Austin.

FRIDAY, APRIL 29TH, 10 A. M.

Section on Obstetrics and Diseases of Children.

James Orr, Terrell, Chairman.
W. J. Pollard, Kaufman, Secretary.

Chairman's Address, "The Influence of Paternalism on the Physiological Development of Children."

"The Underlying Principles of the Nourishment of Infants," James H. Bute, Houston.

"The Treatment of Entero-Colitis," J. W. Scott, Houston.

"Reflex Irritation from Congenital Phimosis," J. C. Irwin, McKinney.

"Occipito-Posterior Positions, with Special Reference to an Unusual Method of Manual Rotation," J. A. Rawlings, El Paso.

"Rupture of the Uterus and Its Treatment," W. A. Bedford, Franklin.

"Does Maternal Mental Influence Have Any Constructive or Destructive Power in the Production of Malformations or Monstrosities at any Stage of Embryonic Development? Report of a Case Seeming to Present an Affirmative Demonstration of the Proposition," J. F. Frazier, Belton.

"The Use of Diphtheritic Antitoxine in the Treatment of Laryngeal Diphtheria," H. A. Burrows, New Boston.

Digitized by Google

FRIDAY, APRIL 29TH, 3:30 P. M.

Section on Ophthalmology, Otology, Rhinology and Laryngology. In Special Room.

Joseph Mullen, Houston, Chairman.
Henry C. Haden, Galveston, Secretary.

Chairman's Address.

"Malignant Growths Involving the Eye," J. O. McReynolds. Dallas.

"A Case of Empyema of the Frontal Sinuses, with Destruction of One Eye," Bruce Richardson, Beaumont.

"Abscess of the Brain Following Middle Ear Inflammation, with Operation," E. D. Capps, Fort Worth.

"Report of a Case of Divergent Strabismus and Its Corrections," Henry C. Haden, Galveston.

"Subcutaneous Injection of Vaseline for the Correction of Deformities," H. L. Hilgartner, Austin.

"A Review of Some Cataract Cases," R. F. Miller, Sherman.

"Treatment of Deafness with High Frequency Current," H. L. Hilgartner, Austin.

"Tuberculosis of the Larynx. Report of Case," E. H. Cary, Dallas.

Llano County Medical Society.

Llano County Medical Society was organized March 17, 1904, with the following officers: President, Dr. W. Y. Fowler, Valley Springs; Vice-President, Dr. H. E. Donges, Castell; Secretary-Treasurer, Dr. C. F. Darnall, Llano; Delegate, Dr. H. S. Selman, Llano; Censor, one year, Dr. D. S. Livingston, Llano; Censor, two years, Dr. W. I. Moore, Kingsland; Censor, three years, Dr. C. F. Darnall, Llano. There are eleven physicians in Llano county.

Eastland County Medical Society.

Dr. J. H. McCracken, of Mineral Wells, the Councilor of that district, called a meeting of the physicians of Eastland county at Cisco, Texas, on March 8th for the purpose of organizing a county society in accordance with the new plan. The following officers were elected: Dr. C. S. Vance, President; Dr. J. L. Johnson, Vice-President; Dr. E. B. Gilbert, Secretary-Treasurer; Delegate to the State Medical Association, Dr. Lee; Censors, Drs. C. S.

Digitized by Google

Vance, E. B. Gilbert and J. L. Johnson. The constitution and by-laws recommended by the State Association were adopted. The meeting adjourned to meet the second Tuesday in April at Cisco, Texas.

San Saba County Medical Association.

San Saba County Medical Society was organized March 23, 1904, with the following officers: Dr. S. M. Rimmer, San Saba, President; Dr. Geo. H. Sanderson, San Saba, Vice-President; Dr. Emmett M. Burleson, Richland Springs, Secretary-Treasurer; Delegate, Dr. Geo. Sparks, San Saba; Censor, one year, Dr. W. S. Sanderson; Censor, two years, Dr. A. D. Nelson; Censor, three years, Dr. C. L. Burns, Cherokee. There are fifteen physicians in San Saba county.

Mississippi Valley Medical Association.

The thirtieth annual meeting of the Mississippi Valley Medical Association will be held at Cincinnati, O., October 11, 12 and 13, 1904. Dr. B. Merrill Rickets has been elected Chairman of the Committee of Arrangements.

American Gastro-Enterological Association.

The seventh annual meeting of the American Gastro-Enterological Association will be held at Hadden Hall, Atlantic City, N. J., June 6 and 7, 1904.

The Wharton County Medical Society.

The Wharton County Medical Society held its regular meeting at Wharton, Texas, April 12, 1904, and a number of interesting papers were read. Steps were taken for the organization of the Eighth District Medical Association, in accordance with the recommendation of the State Medical Association (the details of which were not received before going to press).

Austin District Medical Society.

The fifty-seventh quarterly meeting of the Austin District Medical Society was held in Austin, March 24, 1904. The meeting was called to order by its President, Dr. F. E. Daniel. The min-

Digitized by Google

utes of the previous meeting were read and adopted. Dr. G. W. McCaleb, of Gonzales, read a paper entitled "Ureteral Calculus—Report of Case, Operation, Result" (see elsewhere in this issue of the NEWS), which was freely discussed. Dr. C. O. Weller, of Austin, read a paper entitled "Membranous Laryngitis," which was likewise freely discussed. Dr. J. W. Carhart, of Austin, read a paper entitled "Digitalis and Veratrum Viride Treatment in Pneumonia," which elicited much discussion. Dr. J. A. Holloway, of Round Rock, read a paper on "Gynecology," which was freely discussed by those present. A resolution was adopted, organizing the Seventh Councilor District Medical Society, in lieu of this society, in accordance with the recommendation in the reorganization plan.

After the usual routine business the society adjourned to meet three months later.

The Colorado County Medical Society.

The second monthly meeting of the Colorado County Medical Society was held at the opera house, in Weimar, Texas, on Wednesday, April 13, 1904. A number of interesting papers were read and discussed.

The Brazos Valley Medical Association.

The seventeenth semi-annual meeting of the Brazos Valley Medical Association will be held at Caldwell, Texas, May 10 and 11, 1904. All who attend this famous society will enjoy themselves to the fullest extent, as the hospitality of the people of Caldwell is well known.

The Milam County Medical Society.

The Milam County Medical Society met at Rockdale, March 8th with good attendance and an interesting meeting. The officers elected at the February meeting were: President, E. N. Shaw, Cameron; Vice-President, H. T. Coulton, Rockdale; Secretary and Treasurer, I. P. Sessions, Rockdale.

Travis County Medical Society.

A regular meeting of the Travis County Medical Society was held April 5, 1904. Papers were read by Drs. J. R. Hunter, of

Digitized by Google

Hornsby, Texas, and J. W. McLaughlin, Jr., of Austin, Texas, upon the subject of gastritis, which were freely discussed by the members of the society. Reports were made by the different committees appointed to arrange for the meeting of the State Medical Association. After the transaction of the usual routine business, motion was made that the next regular meeting of the society be devoted entirely to the business side of the doctor's life. Dr. F. E. Daniel was selected to present a paper for that occasion.

Meeting of the City and County Health Officers of Texas.

The City and County Health Officers of Texas, in response to a call issued by State Health Officer Tabor, met in Austin, March 31st, for the purpose of discussing ways and means for preventing the appearance of yellow fever in Texas during the present year, and to discuss other measures for the public health.

The attendance was so large that those assembled were invited into the House of Representatives, where Dr. George R. Tabor called the meeting to order and invited to a seat upon the rostrum the following distinguished sanitarians present: Dr. Souchon, President of the State Board of Health of Louisiana; Dr. Egan, Vice-President of the Board of Health of Louisiana; Dr. Truehart, President of the Board of Health of Galveston; Dr. Richardson, of the Marine Hospital Service, and Dr. Daniel, editor of the *Texas Medical Journal*.

Dr. Tabor called the meeting to order and read the letter sent to each city and county health officer, which stated the objects of the meeting.

Dr. Brumby, of Houston, made a motion that permanent organization be made by the election of Dr. Tabor as chairman and his clerk as secretary of the meeting.

Dr. Tabor was next invited to state his views and plans for preventing the appearance of yellow fever in Texas and what plans to pursue, should it appear in the State. This was done by reading a carefully prepared paper upon the subject, the salient features of which are as follows:

Assuming that the mosquito is the sole means of propagation of yellow fever, and that yellow fever is not endemic in this State, the measures to be taken are, of course, destruction of the mosquito, and the isolation of primary cases. Land quarantine is far from effective, and, from the present scientific standpoint, is not essential. The co-operation of the entire population of a place

Digitized by Google

is absolutely essential to the prevention of the spread of this disease, for though epidemics may have failed to develop from a single case in the past, still conditions may change in time, on account of the non-existence at that time of the *Stegomyia fasciata.* It undoubtedly requires courage on the part of any physician who diagnoses the first case of yellow fever in any community. The love of money and commercial competition are regardless of human health, but, undoubtedly, successful efforts to stamp out the disease must rest upon early diagnosis and isolation of the first case reported in any community. It is far better to treat a suspicious case of malarial fever as yellow fever than to make the mistake of allowing a case of yellow fever to pass the fourth or fifth day without making efforts to protect the community by the means of screens and the general destruction of the mosquito. On visiting a suspicious case of fever, the physician should examine the premises carefully for all breeding places of the *Stegomyia,* as unused cisterns, tubs or stagnate pools of water. Mosquitoes breed only in water, but brush and damp places harbor them in large numbers; therefore, not only should all standing water be covered with oil, but all brush and high weeds must be destroyed. The mosquito already in the houses may be destroyed by burning pyrethrum powder. All cisterns and wells in use should have wire netting over their tops. As much as a teaspoonful of refined petroleum should be placed in each waste pipe leading from sink, etc. Fountains and basins may be kept clean by gold fish. Ordinances should be enacted in every incorporated town for the application of these principles, and these ordinances should be vigorously enforced. Every citizen should be required to report to his physician and the county health officer every case of fever, and if the local health officer is not satisfied with the diagnosis, he should take the necessary means for protecting the public. If this is followed rigidly, we hope there will be no necessity for general quarantine, of the barbarous shotgun quarantine, which reflects discredit upon the whole community. The State of Texas will watch zealously every place of infection to prevent either the introduction of disease or its spreading in this State or across the borders, and you may be sure that a quarantine established by this State will give protection, and at no time will commerce be placed above the lives and health of the State or any of our neighboring States. The result of the recent visit of the State health officers to Mexico was that arrangements were made with Dr. Liceago, chief of the board of health of that country, for co-operation of the two countries in case yellow fever breaks out

Digitized by Google

in either country this summer. Moreover, Dr. Licego says that a large amount of sanitary work should be done in infected places in the Republic, which if carried out will stamp out the disease forever in Mexico. However, it will take several years to do this, and in the meantime we must protect ourselves the best we can from outbreaks from across the Rio Grande. Commencing the first of April the State quarantine against Mexico is effective, and inspection service is to be maintained at railway stations, by both the Mexican and American Public Health Officers. Unfortunately, the State is not financially able to maintain the inspection service necessary.

Dr. Tabor then paid a tribute to the veteran, Dr. Murray, who lost his life while on duty in Laredo. Dr. Murray had been identified with every epidemic of yellow fever in the United States for thirty years.

Much responsibility lies with the press in moulding public opinion upon this matter, suggesting ideas of sanitation, and it is through the press that the people must be educated up to the necessities of the situation.

Col. W. C. Corges has just written a pamphlet entitled "A Few General Directions in Regard to Destroying Mosquitoes." This was reecntly reprinted in some of the daily papers. Also a paper by Major Chas. F. Mason, Surgeon, U. S. A., at Fort Sam Houston, entitled "How Insects Carry Disease." Both are very instructive monographs.

The United States Department of Agriculture issued a bulletin on the destruction of mosquitoes, the sum and substance of which is as follows:

First. Every man is responsible for his own house and yard. Second. Mosquitoes are local, i. e., they live where they breed. Third. Destroy the breeding places, and you destroy the mosquitoes. Coal oil on the water prevents the wiggler, the young, from receiving air, consequently kills them. All standing water should be poured out, if useless, and the water for household purposes should be covered with a wire screen. Pools should be drained, and all grass and weeds burned. Live mosquitoes should be destroyed by burning insect powder in the rooms.

The doctor in closing emphasized the following suggestions: Sanitary inspectors should be appointed, whose duty it shall be to enter the houses and investigate sanitary conditions personally. A sufficient number should be employed to visit each house twice weekly, and an ordinance should be passed prohibiting the use of water barrels without screening or oiling same, under penalty.

Digitized by Google

Also all unused cisterns and wells should be filled, and all used cisterns be screened, oiled or minnows should be placed in them. Ordinary pools and ponds, not containing fish, should be oiled twice weekly.

Dr. Tabor expressed his appreciation of the loyal physicians throughout the State who had rendered him local support throughout the recent epidemic, and also the newspapers who honestly reported the situation, and last of all, the citizens who endeavored to use all means for the prevention of a State epidemic.

Dr. Truehart, of Galveston, was next introduced, and requested to give the meeting the benefit of his observations and experience along these lines, which he did in a concise manner, and made a motion that the paper read by Dr. Tabor be published and distributed all over the State, for the education of not only the health officers but the citizens. This motion prevailed unanimously, after some discussion commendatory of the paper.

A motion was made that the editor of the *Texas Medical Journal* be requested to publish the paper in full, and that reprints be furnished the Health Department for distribution, which was carried, and Dr. F. E. Daniel stated he would cheerfully give space for publication of this valuable paper.

Governor Lanham appeared in the hall and was introduced to the Association. He expressed gratification that the health officers of the State had come to the capitol and were deliberating upon the question as to the best methods upon which to proceed to prevent the State from being visited by another epidemic of yellow fever. The Governor pressed the importance of rigid enforcement of a rigid quarantine as a measure of safety and protection, and urged the doctors to co-operate with the State Health Department to accomplish this end.

Dr. C. W. Truehart spoke briefly, and in the course of his remarks took very high grounds on the importance of exterminating the mosquito. He believed that compulsion should be used if persuasive measures failed to induce the people to resort to this measure of precaution.

Dr. Tabor requested Dr. Sauvenet, city health officer of Laredo, to state the conditions in that city. Dr. Sauvenet said that cases of yellow fever had been discovered in Laredo during the months of December, January and February, but vigorous measures had been applied and no cases reported in March.

Dr. Richardson of the Marine Hospital Corps at Laredo was invited to address the meeting. He read the rules prepared by the

Digitized by Google

service for the disinfection of houses. These rules recommended that an ordinance be passed by the city council imposing a heavy fine upon any property owner if a mosquito was found in his house.

Dr. Lane, of Eagle Pass, said he had understood that there were now several cases of yellow fever in Monterey, and travel on the railroad between Eagle Pass and that city was without any kind of restriction. At the town in Mexico opposite Eagle Pass, a place of 10,000 or 12,000 inhabitants, nothing in the way of improving the sanitary conditions had been done. What the result of this laxity would be filled him with apprehension.

Dr. Souchon, of New Orleans, President of the Board of Health of Louisiana, was invited to address the convention. He outlined an elaborate plan for the enforcement of quarantine regulations, attaching special importance to controlling the movement of railroad trains. Trains from California should not be allowed to enter the State if they had passed through any country infected. And whether they had passed through an infected country or not, they should be required to fumigate and disinfect their coaches in a most thorough manner. "We should say to the people," he said with force, "we are willing for you to travel, but we are not willing for you to scatter the germs of an infectious disease broadcast over the country."

Dr. Egan, of Shreveport, member of the Board of Health of Louisiana, referring to the effectiveness of quarantine, said that "in less than twenty-four hours after quarantine was laid on San Antonio last year, there were people from that infected city in his town.

"If epidemics of fever are prevented, it must be done in part by sanitation. When towns are in proper condition, you can not plant the fever. This is proven by the history of Havana and other cities in Cuba. Here the fever had lived for 150 years until the United States had put them in good sanitary condition, and now they are free from this fever. The watchword therefore should be sanitate, sanitate, sanitate."

Dr. Brumby, city health officer of Houston, introduced the following resolution:

WHEREAS, The recognition of the first case of yellow fever is the keynote to scientific prophylaxes; therefore, be it

Resolved, That when we have positive evidence that it is a prima facie infection, whether there be one, two, three or more cases, and that proper safeguards have been thrown around the same, it

Digitized by Google

is agreed not to quarantine against the city or county in which the infection is located.

Dr. Graves, city and county physician of Austin and Travis county, objected to the resolution because it did not go far enough. He said if all health officers and quarantine inspectors would do their duty there would be no trouble in the enforcement of reasonable regulations. During the last epidemic the quarantine around Austin was so well enforced that a passenger could not get off at an outlying point and walk into town.

Dr. Burg, of San Antonio, thought that yellow fever could be easily controlled, and that there was no use in adopting the resolution or any other form of quarantine. Quarantines do not have the support of the people, he said, and already one San Antonio paper has declared that the first physician that announces a case of yellow fever in that place should be tarred and feathered and drummed out of town.

Dr. Olive, of Waco, moved to table the resolution, which was carried unanimously.

Dr. Nott introduced a resolution pledging the members of the conference to notify the State Health Officer of the first case of yellow fever that appeared in their localities, and pledging their best efforts to stamp it out. This was adopted by a vote of 25 to 17.

Dr. Truehart, of Galveston, was requested to address the convention. He responded briefly, urging the physicians to go home and wage a truceless war on the mosquitoes.

Dr. Daniel, of Austin, was invited to speak, saying: "It seems to me that the desideratum desired and to be sought for is some means whereby quarantine may be avoided. A quarantine of absolute non-intercourse is wrong in theory, and ruinous in practice. Dr. Grace has compared an infection in a community to a murderer at large, and the simile is fitting and appropriate. Instead of every citizen shutting himself up in his home, with bolted doors, a prisoner indefinitely, the murderer should be shut up! But, as Mrs. Hale said in giving directions for cooking a hare, 'first catch your hare.' There is the difficulty. The first case or cases of yellow fever are not recognized. As Dr. Tabor has said: 'The first case recognized, diagnosed and declared is usually the thirtieth or fortieth case,' and the gap is only put up after the cow has gotten out. When yellow fever is first talked about, the first cases are diagnosed 'dengue.' The diagnosis of dengue is easy. The differentiation of yellow fever is difficult, and I will

Digitized by Google

defy any man to make it, unerringly, when both diseases are prevailing at the same time and place.

"The local physicians wrangle about the diagnosis, and, later, begin to admit the presence of 'suspicious cases.' Experts are called in; they differ and wrangle, and if anyone says 'yellow fever' there is talk of tar and feathers. Acrimonious controversies are carried on, even in newspapers, as at San Antonio lately, and bitter personal feelings are engendered. This is disgraceful. A rational quarantine is possible, and should take the place of our barbarous system of stopping the wheels of commerce and travel—of isolating a town, cutting it off from the world, with its people shut in with the infection, like rats in a burning building, none allowed to escape—at the risk of shotgun quarantine at the border of every other town. It is an anarchism; it belongs to a barbarous age; it is out of date; it is unnecessary. The time has come when an enlightened people in an enlightened age should control infectious diseases without resorting to such ruinous, and, most frequently, ineffectual methods.

"The first essential to a rational system is to catch your murderer and lock him up. Detect the first case of yellow fever.

"Gentlemen, *look for your first case of yellow fever in your first case of dengue.* Dengue is a wolf in sheep's clothing. I have come to regard it as yellow fever masquerading. I have observed that an outbreak of yellow fever always begins with mild cases, usually diagnosed as dengue. It spreads rapidly, the virulence increasing as the cases multiply until, presto, one dies, throwing up black vomit, and we have an epidemic of yellow fever in full blast. Dr. McLaughlin, in *Texas Medical Journal*, January, 1904, has promulgated the belief that the yellow fever, as we have seen it in recent years, is produced by an attenuated yellow fever poison, and accounts for the low mortality, as compared with that of former years, in this way. We have seen the same thing in smallpox. Smallpox in recent years is so mild in many outbreaks that the patient sometimes does not quit work, and many physicians stoutly deny that it is smallpox; nevertheless, now and then occurs a fatal case of confluent or hemorrhagic smallpox, contracted from one of these mild cases, denominated in Texas, by some, 'Cuban Itch.' Yellow fever, the grave kind, bears the small relation to the so-called 'dengue,' that the fatal smallpox bears to the so-called 'Cuban Itch.' They are one and the same, differing only in degree.

"No well informed physician now doubts that the *Stegomyia*

Digitized by Google

mosquito transmits the yellow fever poison. That has been abundantly demonstrated; but it has not been demonstrated that there are not other possible methods of spreading it, and it is the part of wisdom to take precautionary measures against such possible methods. For instance, who knows but that the germ of yellow fever (whatever it is, for no man has seen it; it defies the microscope and the finest filter) may not pass in the feces and urine, and be conveyed by flies, as are typhoid fever and diphtheria? Our knowledge that the *Stegomyia* infects man, is empirical; no man knows how it is done. Dr. Finlay submits, however, a rational working hypothesis, which you all doubtless have seen. He assumes that with the sting of the insect there enters into the blood, the yellow fever infection, which is assumed to be of the nature of a spore, and which, I think, he calls 'sporozoit.' This engenders metamorphosis in the blood, developing into what, in higher forms, would correspond to larvæ, and perhaps a pupal stage, when the sexes are differentiated. These entering into the mosquito's intestinal tract, develops into an adult 'parasite' (see Report of Yellow Fever Institute, M. H. S. Bulletin No. 3, for illustration), which parasite, after so many days, matures sporozoits, or some kind of a spore or germ, and infects other persons. The infection is thus handed from man to mosquito, and from mosquito to man, and the disease is kept alive indefinitely. Now who knows but that this infection, 'sporozoit,' may not cling to the feces, or be passed in the urine and be transmitted to man? Why may it not enter the circulation through the stomach or lungs, as well as by inoculation?

"Hence, I would say; the steps necessary to a rational system of prophylaxis should embrace more than the destruction of mosquitoes. In any and all non-infected places there is no danger of mosquitoes, but there is of flies. They should be exterminated also. The mosquito is dangerous only when he has fed on infected blood.

"Every case of dengue should be at once isolated, and the rooms screened. None but immune persons should enter the room. The dejecta should be promptly destroyed. All fugitives from the town should be detained in camp five days, and all their baggage fumigated. All cars should be fumigated and allowed to proceed. If these methods are followed, I hope to live to see the day when we will have no more ruinous quarantines and no more panics and epidemics of yellow fever."

The meeting then adjourned to meet one year later in Austin.

Digitized by Google

Proclamation of Quarantine Laws.

The following proclamation by the Governor of the State of Texas was issued March 31st:

Be it known, that I, S. W. T. Lanham, Governor of the State of Texas, by authority vested in me by the laws of this State, do hereby declare that quarantine shall be established on the gulf coast and Rio Grande border on and after April 1, 1904, and it shall continue until closed by proclamation.

First—Said quarantine shall apply to all vessels, persons or things coming from places infected with yellow fever, smallpox, bubonic plague, or cholera, and all places south of 25 degrees north latitude shall be considered infected unless proof to the contrary be submitted to the State Health Officer, and special exemption be granted to said places, and persons from such places are prohibited from entering this State within a period of time prescribed by the State Health Officer.

Second—I further declare quarantine against any person or persons infected or liable to be infected with yellow fever, smallpox, bubonic plague, or cholera, and direct the State Health Officer and officers of the counties and towns to establish quarantine around any and all such persons whenever in their opinion it is necessary.

Third—The coast quarantine stations shall be governed by the following rules:

(a) Not less than five days must have elapsed, from the day of sailing from an infected point, before vessel will be allowed to enter the ports of Texas, except fruit vessels and such vessels as have been given written permits to do so.

(b) Vessels arriving outside the bar of Texas ports, with sickness on board at the time of arrival, either yellow fever, smallpox, bubonic plague, or cholera, must be brought inside of the bar by pilots, must be at once reported to the local quarantine officer, who will at once report same to the State Health Officer, and he will endeavor to have such vessel ordered to the nearest United States marine hospital station for treatment.

(c) Vessels from an infected place having had sickness or deaths en route, but having no sickness at the time of arrival, will be disinfected and held seven full days after disinfection, under observation, before being released, and a longer time if considered necessary by the State Health Officer.

Digitized by Google

(d) Vessels from places actually infected, and having been at sea longer than ten days, will be disinfected and held under observation five full days, unless special permission is given by the State Health Officer to enter sooner.

(e) Vessels with cargo or passengers from non-infected places south of 25 degrees north latitude, with clean bills of health, and having had no sickness on board, will be disinfected, and may be released without detention if, in the judgment of the local quarantine officer, it is safe to do so.

(f) Pilots will be detained in quarantine a sufficient time to cover the period of incubation of the disease for which the vessel is quarantined if, in the opinion of the quarantine officer, such pilots have been exposed to infection.

(g) No direct communication will be permitted between any vessels or persons in quarantine with any person outside, except with the quarantine officials.

(h) Vessels wishing to engage in the fruit trade will be allowed to do so under special restrictions and regulations governing the same.

Fourth. Vessels or persons detained at any quarantine station or detention camp will be subject to such additional rules and regulations as the State Health Officer may prescribe.

Fifth. Nothing in this proclamation shall be construed as giving authority to local health and quarantine officials to promulgate regulations which conflict with any regulation established by the Governor or the State Health Officer, or to interfere with the movement of the State health and quarantine officials, military or police officers operating under the direction of the Governor or State Health Officer in quarantine matters.

All officials, military authorities and citizens of Texas are solicited to assist the quarantine officers in the execution of the above rules, and are earnestly requested to notify the Governor of any dereliction of duty by officers or employes, or any other facts that will give greater efficiency to the quarantine service.

In testimony whereof, I have hereunto signed my name and have caused the seal of the State to be affixed at the city of Austin, this the 31st day of March, A. D. 1904.

(Signed) S. W. T. LANHAM,

By the Governor:

(Signed)

J. R. CURL,

Secretary of State.

Digitized by Google

THE TEXAS MEDICAL NEWS.

A JOURNAL OF MEDICINE, SURGERY AND HYGIENE.

MATTHEW M. SMITH, M. D., Managing Editor.
JAMLS M. LOVING. M. D., Assistant Editor.

ASSOCIATE EDITORS.

S. C. RED, M. D., Houston,
J. W. McLAUGHLIN, M. D., Galveston,
A. M. ELMORE, M. D., Dallas,
R. W. KNOX, M. D., Houston,
H. A. BARR, M. D., Beaumont,
T. J. BENNETT, M. D., Austin,
E. D. CAPPS, M. D., Fort Worth,
G. B. FOSCUE, M. D., Waco,
WM. E. LUTER, M. D., San Antonio,
A. C. SCOTT, M. D., Temple.

The Texas Medical News Publishing Co., Publishers, Austin, Texas.
OFFICE OF PUBLICATION, 101 WEST SIXTH STREET, AUSTIN, TEXAS.

BRANCH OFFICES.

Corner Sixth and Houston Streets, FORT WORTH, TEXAS.
215 Main Street, DALLAS, TEXAS.

Subscription, $1.00 per annum in advance. Single copies, 10 cents. Advertising rates on application.

MORPHINE ADDICTION AND ITS TREATMENT.

Every physician is familiar with the prevalence of the drug habit in this country, and until recently the very small percentage of cures. In fact the treatment of the drug habit for a long time was relegated by the profession almost entirely to the pretender, the deceiver and the quack; but thanks to the advance of rational medicine, some of our most enlightened and educated physicians are devoting their life work to the treatment of these unfortunate victims, and many institutions are being established for this purpose, which are conducted upon strictly ethical lines. Concerted action is now beginning to be taken by the public and the law-making powers to prevent drug habits. It has been wisely said, "There is nothing in this twentieth century of ours that is causing so much want, distress and unhappiness as whisky and morphine.

We are all familiar with the appearance and symptomatology of the morphine habitué; we shall, therefore, not describe him in detail. "Many a bright, promising life is ruined by this entrancing drug, where ambition, home, family, pride and honor are cast aside, when this fearful craving assails the victim." Mental and physical ruin is the result. The methods of treatment under the old regime are more or less familiar to all. Sudden with-

Digitized by Google

drawal of morphine without any preparatory treatment, and the patient supported by alcohol and other stimulants. Rapid reduction method without preparatory treatment, the drug is reduced to one-third the first day, and the same reduction for each succeeding day until an entire withdrawal is accomplished within a week. The gradual reduction method, which has been almost universally accepted as the treatment of the drug habit until very recent years. This method, however, has proven to be unsuccessful, besides entailing a great amount of suffering upon the patient. There are other more successful and more humane methods of treatment for the drug habit, but we shall confine our editorial to a discussion of the hyoscine treatment.

We often read of two investigators in different portions of a country, or of the world, pursuing the same line of investigations or experiments, and reaching the same line of conclusions contemporaneously, each entirely unknown to the other. There is an unconscious mental impulse, a mind transference, or a telepathy that explains such coincidences. Such conditions obtained in the discovery and use of the hyoscine treatment for the morphine habit. We are pleased to say that both of the investigators were from Texas, the one a native and afterward adopted by another State, Dr. George E. Pettey, of Memphis, Tennessee, and the other, now living in Texas, Dr. M. K. Lott, of Cameron, Texas. The similarity of their observations, methods and results is remarkable. Dr. Pettey gave publication to his treatment a short time before Dr. Lott. A paper entitled "The Narcotic Drug Habits and Their Treatment" was published in the *Therapeutic Gazette* in October, 1901, and Dr. Lott published a paper on the same subject in the *Texas Medical Journal* in November, 1901, although this paper was read by Dr. Lott in May, 1901, before any public announcement had been made by Dr. Pettey. As to who gave priority of publication or priority of having read papers to the profession, or who first announced their results to the profession, we care but little, in as much as this knowedge has become common property and the drug habitué has become the benefactor. There is certainly honor enough for both these physicians, and all others who are working in this field, and we believe Dr. Pettey and Dr. Lott will wear these honors with becoming modesty, and each has assisted in perfecting the best plan of treatment known to us. The plan of treatment, which we will call the Lott-Pettey plan of treatment, and we shall in a general way briefly outline.

The treatment of Dr. Lott is as follows: Examine heart and

Digitized by Google

kidneys of patient, give him warm bath and put him to bed, have a thoroughly reliable and competent nurse to be with patient constantly. Give him the usual dose of morphine one or two hours before commencing the treatment. Begin with 1-100 of a grain of hyoscine hydrobromate and 1-20 of strychnine nitrate, and give 1-200 of a grain of the hydrobromate of hyoscine thirty to forty-five minutes to one hour until the amount is determined which will affect the patient, and then the same dose is given every hour for forty-eight hours. The pulse is carefully watched, and a dose of strychnine, digitalin or nitroglycerine given occasionally as indicated. At the end of the forty-eight hours, the patient is usually allowed to come from under the influence of the drug, and soon wakes up and says he feels well. It is necessary to impress upon him the fact that the length of time for treatment will depend upon his having reached a point when he feels sure he will not want the drug again, then administer pilocarpine 1-8 grain, as required, and it may be nesessary to re-inforce this with strychnine, 1-20. The mouth which has been dry under the hyoscine treatment, becomes, under the action of pilocarpine filled with saliva from stimulation of the salivary glands, the urine becomes abundant, clear, the skin very active. The diarrhea which supervenes may become very troublesome, but this symptom is best controlled by bismuth subgallate, the fluid extract of coto bark, thirty to forty drops four or five times a day. On account of the dry tongue and throat, the result of the effect of hyoscine, water is indicated freely, and the dilated pupils warn us to guard against too much light. No food is indicated during this intoxication, for fear of mal-digestion, and increase of diarrhea. While just emerging from under the influence of the last dose of morphine, and after the administration of several doses of hyoscine, the patient may awake in a very flighty condition, but is usually easily controlled. Hyoscine and morphine are physiologically antagonistic, and should the patient become too boisterous, a quarter grain of morphia hypodermically, repeated if necessary, will quiet him. During all of this period there has been no conscious suffering, such as seen when the habitué is suddenly deprived of morphine. This is the feature of the treatment that makes it of infinite value. Appetite, digestion, assimilation, sleep and the equilibrium of the nervous system essentials to the health of man have been seriously impaired. What remains to be done is to rebuild the shattered constitution. Pains will be experienced in the back, arms and legs, which are best relieved by

Digitized by Google

electricity and mechanical measures. If pain or insomnia be too s vere, this condition may be relieved by a few doses of hyoscine hydrobromate. Other symptoms should be met on a rational plan, avoiding, of course, all forms of opium or its derivatives until the patient is in a position to hold his own. So much for the treatment of Dr. Lott.

Let us now consider that of Dr. Geo. E. Pettey. According to his idea, the principal pathological fact to be contended with is that of auto-toxemia. A thorough cleansing of the system of toxic and effete matter will eliminate the most distressing and dangerous symptoms incident to the withdrawal of the drug. The skin and kidneys may be made to act more or less easily, but emptying the alimentary canal is not so easy, for the morphine has paralyzed more or less permanently the peristaltic action. Here strychnine is plainly indicated, and is used until the bowels are fully emptied. One-third of a grain of strychnine, together with cascara and ipecac is to be administered in six hours. Morphine should be given up to this time. Castor oil, or a saline laxative may be used to completely clear the alimentary tract, and when this is accomplished, the hyoscine is begun and given at such intervals as required to relieve the patient and keep him comfortable. It is safe to begin with 1-200 grain, and repeat it at short intervals until this is accomplished, for the amount of hyoscine that will effect this will exert all the remedial effects that can be expected of it. This administration lasts twenty-four to thirty-six hours, and is then discontinued. Here again free purgation is indicated; here drugs cease. The prolonged administration of medicine of any kind keeps up the patient's dependence on it, and prevents the development of that self-reliance necessary for a cure. In the treatment during convalescence, all forms of stimulation are acutely felt by the system of the patient, and seriously aggravate the tendency to insomnia, so that tea, coffee and alcohol are contra-indicated. Different persons act differently under the influence of hyoscine, which makes the small dose the safest plan. The physician's self-confidence and assurances to the patient that the treatment will be a successful one are of paramount importance. Heart failure and collapse do not occur in the above outlined treatment.

Of far greater value, however, than relieving the sufferers of this fearful but enticing habit is its prevention. Among the more important measures which occur to us are first, the rearing and education of the youths of the country, keeping from them at all times stimulants and narcotics of various kinds; this

Digitized by Google

must be accomplished in the home circle by precept and example and by a proper understanding of the evils and dangers of such drugs by educational methods. Second. The medical profession should be taught and admonished to exercise the greatest care in the administration of any narcotic, and when administered the necessity of withholding from the patient the knowledge of the drug that is being taken. A physician should never write a prescription containing a narcotic without specifying on the same that: "This prescription is not to be refilled nor copied." Too often, too often, we hear the expression, "Dr. —— was the cause of my having the morphine habit." This charge is often false; but be very careful not to be even suspicious of this guilty charge. Third. The greatest of all methods for the prevention of this habit is suitable legislative enactments which will prevent the sale of all narcotics except under restrictions (but not in the manner set forth in the late law, which permits their use ad libitum if purchased without the State, or disguised in a patent medicine). The law should compel all patent, proprietary, and family medicines containing any narcotic, to publish the exact formula on the bottle, and restrict their use by the druggist in his counter prescribing.

By a combination of all these methods, together with others, let us hope to liberate those already victims from these fearful habits; but, greater still, to prevent and to protect future generations from their enslavement.

ENTERTAINMENT FOR THE LADIES OF THE STATE MEDICAL ASSOCIATION.

The program of entertainment for the ladies who will attend the meeting of the State Association this month, in Austin, has been completed. On the first evening, Tuesday, April 26th, at 8 p. m., will be the President's address, and the annual oration at the University auditorium, which will be followed by music and a general promenade about the building. On Wednesday afternoon, from 4 to 6, Governor and Mrs. Lanham will tender the Association, and ladies, a reception at the Mansion, and from 6 to 8 the Sisters of Charity of the Seton Infirmary will receive all callers. Wednesday or Thursday morning Mrs. Dr. T. J. Bennett will entertain the ladies with a drive over the city, to be followed by a *buffet luncheon* at the Austin Golf Links. On Thursday afternoon Dr. and Mrs. Goodall H. Wooten will receive at their elegant home from 4 to 7 o'clock. On Thursday evening the

Digitized by Google

grand reception and ball, given by the Travis County Medical Society in honor of the Association, will be held at the Driskill Hotel. Elaborate preparations are being made for this occasion, and it is looked forward to as one of much enjoyment. The Travelers' Protective Association will give a ball and reception Friday night at the Driskill Hotel, and have invited the physicians and their ladies to remain over. We feel sure that all ladies who honor us with their presence will have a good opportunity to see the sights of the Capital City, and will thoroughly enjoy their visit.

BUREAU OF INFORMATION FOR THE STATE ASSOCIATION MEETING.

The Travis County Medical Society has appointed a committee of five, to be known as a bureau of information. This committee is composed of Drs. J. W. McLaughlin, Jr., J. W. Gibson, S. H. Haigler, H. F. Sterzing and J. M. Loving (all old bachelors), whose duties are to arrange and classify hotels and the private boarding houses of the city, and to open a bureau of information near the depots. They will meet all incoming trains, and assist visitors in every possible way to get comfortably located on their arrival in Austin. We suggest that physicians on arrival look for this committee (who will wear badges), and ask for such assistance and information as desired. Those desiring information before the time of meeting, will address the secretary of the committee, Dr. James M. Loving, Box 177, Austin, Texas.

THE MEETING OF THE STATE MEDICAL ASSOCIATION.

We publish herewith the program of the next meeting of the State Medical Association, and we urge our readers to give it a careful reading, believing that they will agree that this will be one of the most scientific meetings in the history of the Association. Under the reorganization plan, very much more time will be available for the reading and discussion of scientific papers, and all physicians who are desirous of spending four days in the pursuit of scientific medicine, would do well to attend this meeting. A number of interesting social features have been added to the program, but are not, however, to interfere with the sessions of the Association. Excursion rates have been secured on the railroads, the time of meeting is most appropriate, and the

Digitized by Google

place of meeting of unusual interest. We would like to see every physicians in the State, who can possibly get away from his business, to come to Austin and enjoy this meeting.

There will be much to engage the attention of the Association in reference to the legislative and business management. This is the first meeting to be held under the reorganization plan, and the business management of the Association will be entirely in the hands of the House of Delegates, which will meet Monday, April 25th, at 2 p. m. The duties of the Judicial Council under the old management will be performed by the fifteen Councilors of the Association, selected at the San Antonio meeting.

Many important legislative questions will engage the attention of the Association, as well as questions dealing with the direct management of the State Association. We could scarcely expect to pass from the old plan of management, with a membership of a little more than three hundred, to a plan of new management with a membership of over two thousand, without some little inconveniences, but we feel confident that the one can be merged into the other without difficulty and with great benefit. We again urge all physicians, who can possibly do so, to come to Austin and bring with them their wives and daughters.

A MEETING OF THE CITY AND COUNTY HEALTH OFFICERS OF THE STATE OF TEXAS.

We have given much space in this issue to a report of the city and county health officers for the State of Texas, called by State Health Officer Tabor. The meeting was well attended, and the paper read by Dr. Tabor was a most excellent one, and those present seemed to realize the great responsibility resting upon them, and the necessity for careful watch and eternal vigilance in order to keep yellow fever out of the State during the present year. The interchange of ideas and the full understanding of the duties of the city and county health officers of Texas, and the necessity for quick and thorough action, should the occasion arise, will no doubt result in much good.

We reproduce the suggestions made in our editorial on "Yellow Fever in Texas," published in the December issue of the NEWS, which is as follows:

First. The United States should make suitable appropriations for the proper maintenance of suitable men and equipment near the border for investigation.

Second. Concerted action should be taken by the United States,

Digitized by Google

the State of Texas and Mexico for active measures for its suppression, to be enforced in Mexico, where the disease is always present.

Third. The State of Texas should supplement our present State Health Officer with additional competent physicians, in the form of a State board of health, with the present officer as its chairman with full authority to act, without consultation, when necessary; but able to call to his assistance other men learned in the profession and coming from different portions of the State. This would give him additional assistance in such epidemics; but, in addition, give men for other official duties that must by necessity arise during an epidemic.

Fourth. The State should make large provisional appropriations that could be made available in case of an epidemic, and thereby be able to pay those physicians who leave their business, families and even sacrifice their lives, a competency in keeping with the duties performed and meet all other demands. Be able, for example, to buy instead of beg a carload of oil when needed.

Fifth. Harmonious action of the medical profession should be encouraged by the State and county associations, and a proper study of the mosquito theory should be encouraged by the entire profession.

Sixth. Active and concerted action should be taken with the first suspicious case, and have same isolated and observe every possible precaution, even though it turns out to be nothing more than a case of malarial fever, dengue or Bright's disease.

Seventh. An active warfare should be made upon the mosquito at all seasons of the year and at all places where they exist. (This is equally as good for the prevention of malarial fever.)

Eighth. Encourage every one to screen their houses and make liberal use of mosquito bars at all times.

Ninth. Amend our laws so as to give our health officers all the authority and means necessary to begin work with the first suspicious case, but also make their salaries sufficiently high so as to command the best medical men of the community, and let the head officials see to it that they keep abreast with the times in the later methods of prevention of disease.

We have thus drawn out in a hurried and disconnected way our editorial upon this important question and trust all will become aroused to the importance of this great work and make an earnest effort to keep yellow fever forever from our State, and may quarantine become a thing of the past and be looked upon as a crude method used by our forefathers as they gathered experience and handed it down to us for the employment of better methods.

Digitized by Google

Abstracts and Selections.

Tubercular Glands.

Sutcliffe, in the *Lancet,* describes the operation for tubercular glands of the neck. He lays particular stress on the fact that the internal jugular vein and the spinal accessory nerve are to be carefully protected from injury. He has seen dropping of the shoulders, atrophy of the sterno-cleido-mastoid and trapezius muscles follow injury of the spinal accessory. He also urges that not only are the glands to be removed, but also the loose cellular tissue around them is to be carefully dissected away. In this connection I may mention that Dr. Dollinger, of Budapest, employs as his incision for the removal of these glands, one skirting the hairy scalp. In these operations the scar formation is not noticed. The incision is made high in the scalp and the skin is dissected up and glands removed. It would seen impractical in cases where the glands are suppurating. Unterberger has adopted the saline douche for the treatment of this affection, and claims good results thus obtained. His mode of procedure is as follows: A stream of concentrated salt solution as hot as can be borne is applied to the glands for three or four minutes, and then followed with hot saline compresses of one tablespoonful of salt to a glass of water. His success has been so good he claims he has been using same treatment in subcutaneous bone infiltration and joint affections.—*Southern Medicine and Surgery.*

Antitoxins and Agglutinins in the Blood of Immunized Animals.

Figari investigated the serum of horses and cows immunized against tuberculosis to determine whether the antitoxic and agglutinating bodies were contained in the serum or in the leucocytes. In every case the serum obtained by immediately centrifugalizing the blood, defibrinated as soon as shed, had a much weaker agglutinating and antitoxic power than the extract obtained from the cellular residue, or the serum separating spontaneously after coagulation. Although this does not completely exclude the possibility that such bodies may exist in the circulating plasma, the author believes that the agglutinins and antitoxins are present in the greatest amounts in the cellular constituents of the blood.—*Berliner klinische Wochenschrift.*

Digitized by Google

Yellow Fever Etiology.

C. J. Finley reviews the experimental findings of the last three years. It is believed that from ten to twelve days must elapse between the bite of the stegomyia of the yellow fever patient and the inability to inoculate another patient. *Alas, for the poor mosquito's body, what a series of transformations are going on therein :* (a) Introduction of young sporozoits sucked up with the blood of the patient. (b) Growth of the sporozoits to adult age. (c) Formation of schizonts and merozoits. (d) Formation of gametes. While in the body of the non-immune, counting from the moment of his inoculation by the infected stegomyia, the following stages are likely to take place during the period of incubation: (a) Localization of the gametes in appropriate sites. (b) Fecundation of the ookinet and development of the oocyst in appropriate cells (endothelial)? (c) Discharge of free sporozoits of yellow fever into the circulating blood (perhaps too small to be recognized with the microscope). (d) Development of the toxæmic symptoms characteristic of the invasion of yellow fever in the inoculated non-immune.—*Exchange.*

Immunization of the Human to Typhoid.

Shiga immunized two individuals with a 24-hour agar culture of bacillus typhosus which had been rubbed up with a 5 cubic centimeters of a physiological salt solution heated to 60° C., and then kept for two days at a temperature of 37° C. and filtered through a porcelain filter. The serum of the two people treated evidenced a decided agglutinative property of the typhoid bacillus, as well as a bactericidal power, and the author concludes that this operation is devoid of danger and probably of practical value. —*Berl. klin. Wochenschr.*

Removal of the Crystalline Lens in the High Degrees of Myopia.

Simeon Snell believes that within defined limits the removal of the crystalline lens for high degrees of myopia may be regarded as a recognized and valuable method of treatment. The operation should usually be limited to cases with a myopia of 14 D and upward. The total number of suitable cases must then always be a comparatively small one. Extraction was deemed unsuitable and was in no instance adopted. In each case the transparent

Digitized by Google

lens was needled, and at the end of a week, more or less, when the lens substance had become sufficiently broken up, an incision with a broad needle was made a little distance inside the periphery of the cornea, and the softened lens allowed to escape, or coaxed out with a curette. The pupil should be previously dilated with atropine. Increased tension must be looked out for. Whatever of the lens remains, will undergo absorption. The results of a successful operation are vision as good or better without glasses for distance as it was previously with their assistance.—*British Medical Journal.*

Some Clinical Aspects of the Rheumatic Infection.

A group of cases is reported by Carey Coombs, who believes that in many cases of rheumatic infection the organism of the disease persists in the tissues after all obviously inflammatory signs and symptoms have disappeared, in a comparatively, but not absolutely harmless state, capable of re-exaltation in virulence under favorable conditions. This is evidenced by the long period often existing between a rheumatic attack and the appearance of cardiac symptoms, by the occasional outbreak in such a case of malignant endocarditis, by the frequent relapses of rheumatic fever, by the recurrence of rheumatic affections at very long intervals, and by the prolonged course of chorea and of endopericarditis in childhood. Moreover, the author calls attention to (1) a certain similarity of effect in rheumatism, whatever the tissue affected, and (2) the capability of such infection to inflict any degree of damage on the tissues attacked within certain limits.—*The Lancet.*

Appetite Juice and the Ethics of Eating.

J. G. Adami reviews Pawlow's experiments on dogs, by which it has been proved that there are two tides of secretion of the gastric juice; the psychic tide, set up by the sight of food, by the taste of the same, and by hunger, the juice of this tide (the appetite juice) being relatively abundant, flowing for a considerable period, and having strong digestive powers. The chemical tide is set up at a later period by the direct effect of the foodstuffs upon the gastric mucous membrane. The former is brought into activity by the higher centers; taking everything into consideration it is the more important. Food eaten without relish and without appetite, although in itself most nutritious, may lie for hours within the stomach undigested. So again, food eaten while the mind is di-

Digitized by Google

verted to other things, may stay for a long time unacted upon, or is liable to undergo decomposition, and, irritating the mucous membrane, may lower its condition. If, therefore, dyspepsia is to be worked off, the food should be taken under such conditions that everything is directed, on the one hand, to remove the thought from the cares of daily life, and on the other to make the repast appetiznig, so that the palate may be tickled and the flow of appetite juice excited.—*The Montreal Medical Journal.*

Colorless Negroes.

An Indiana physician believes that by means of properly controlled influences on negro infants he can prevent them from turning dark. It is known that negro children are born white, or nearly so, and the reason assigned by the Indiana man for their growing dark later in life is that the skin if the negro is extremely sensitive, throwing out large quantities of pigment as a means of protection. His plan for testing his theory is to have the room in which the experiment is to be carried out draped and furnished in red, with red lights and all attendance dressed in red garments. The infant undergoing the experiment is also to be clad in red. Under these conditions he believes that the child will retain its original white color. The experiment promises to be interesting. We trust that no convalescent from the tremens ward will ever get into the experiment room by mistake. A relapse would be practically assured.—Exchange. Horseless carriages, wireless telegraphy and blackless negroes. Now for spotless leopards, and we will be on the highway to progress.

A Case of Gangrene in the Right Foot Occurring in the Newly Born.

D. Cotes-Preedy reports the case of a child born asphyxiated and revived, though living only three hours. Examination of the body revealed the following condition: the skin of the lower half of the right leg in front, of the dorsum of the foot, of the dorsal aspect of the first toe, of part of the dorsal aspects of the second, fourth, and fifth toes, and of the inner half of the under surface of the foot, including that of the great toe, was intensely red and devoid of its epidermal structures, being, in fact, in a state of early gangrene. On the dorsum of the foot the area corresponding to the cutaneous distribution of the anterior tibial nerve was specially affected. The gangrene, which was moist, affected only the skin and

Digitized by Google

subcutaneous structures, the deeper parts being healthy; its line of demarcation was sharply defined. No cause could be assigned for the condition found. Two months before delivery the mother had had two severe falls, both times striking on the right side.

Ficker's Typhoid Fever.

J. Meyer has tested the accuracy of the results obtained by Ficker's method of using dead typhoid bacilli as a test of the agglutinating power of suspected sera, with those given by the ordinary Widal reaction carried out with the living organisms. The results obtained by the two methods of performing the reaction were the same, and the control tests on non-typhoid blood were equally satisfactory. The author, therefore, considers the method of advantage, since it is simple to carry out and is not apt to give discordant results owing to differences in the activity of the cultures used as is the case in the Widal reaction done with living bacilli.—*Berliner klinische Wochenschrift.*

Shoulder Dislocation.

Keetley, in the *London Lancet*, says that the usually accepted limit for even attempting reduction of dislocated shoulders is three months. The symptoms of an old unreduced dislocation differ in some respects from those of a fresh one. Instead of swelling there is wasting of the deltoid and the absence of the head of the humerus from the glenoid is very obvious. But the projection of the elbow from the side is less, and the range of movement of the point and of the scapula on the trunk is increased. The X-Rays are often of assistance. If no complication co-exists the prognosis of dislocations two or four weeks old is absolutely favorable, up to the ninth week very good, after nine weeks bad unless a cutting operation be performed. The administration of chloroform in these cases is especially dangerous. Either no or very little anesthetic should be used, or the patient should be put completely under the anesthetic before reduction is attempted. Never attempt to push the anesthetic during the operation. If the breathing stops while strong extension is being made, the surgeon should at once desist. The axiliarly vessels are often injured, as many of these cases have bad vessels due to advanced age, dissipated habits, etc. Nerve injuries are comparatively rare. The treatment of these old cases lies between making the best of the new abnormal joint by exercise, massage, etc., and

Digitized by Google

attempting to effect reduction by means of (1) manipulation or extension; (2) open incision; and (3) excision. Reduction without cutting may reasonably be tried up to the end of the fourth month, except in old people with atheromatous arteries. If Kocher's method fails extensions and circumduction may be tried, by means of Skey's nob, etc. The structure especially endangered is the axillary artery. Other methods of extension are continuous elastic extension by means of a rubber air pan in the axilla, and Stimson's couch, which is perforated to allow the arm to pass through, a ten pound weight being attached to the hand. He claims to have been the first surgeon to reduce dislocation of the shoulder-joint by open operation: this he did in January, 1890. It is difficult to preserve prefect asepsis in these operations for the following reasons: 1. The operations are prolonged. 2. The wound is large and deep. 3. Retraction is rough and prolonged. 4. The displaced head vacates a large space which does not fill up. 5. Drainage is contrary to gravity. 6. Several assistants are required. 7, 8 and 9. There are numerous chances of infection. 10. The patients are usually "bad subjects." When it is found necessary to excise the humeral head the stump should be wrapped in gold leaf to prevent adhesions. After a few weeks the shoulder should be reopened and the gold leaf removed. After the wound has healed passive movements should be begun, but abduction should be avoided for months.

An X-Ray Tube With Adjustable Focus.

R. V. WAGNER, M. D., CHICAGO.

If one examines the outline of a shadow from a light emanating from a large area—e. g., a gaslight—it will be seen to compare favorably with the outlines on a fluoroscope or on a picture, when the X-Ray is used from a tube having the anode out of focus. On the other hand, the outlines of a shadow emanatong from a small area—e. g., an arc lamp—resemble the outlines of a fluoroscope or on a picture, when an X-Ray tube having a sharply focused anode is used (Figs. 1 and 2).

The X-Ray emanates from the molecular bombardment of the rarified air in the tube on the surface of the anode. The structures of rarified air are repelled from the concave disc or cathode forming the cathode rays or stream. This cathode stream striking the surface of the anode disc in the center of the tubc produces the X-Ray. To obtain a sharp focus the anode must be a given

Digitized by Google

distance from the cathode, just as an object must be a given distance from a lens to be in focus.

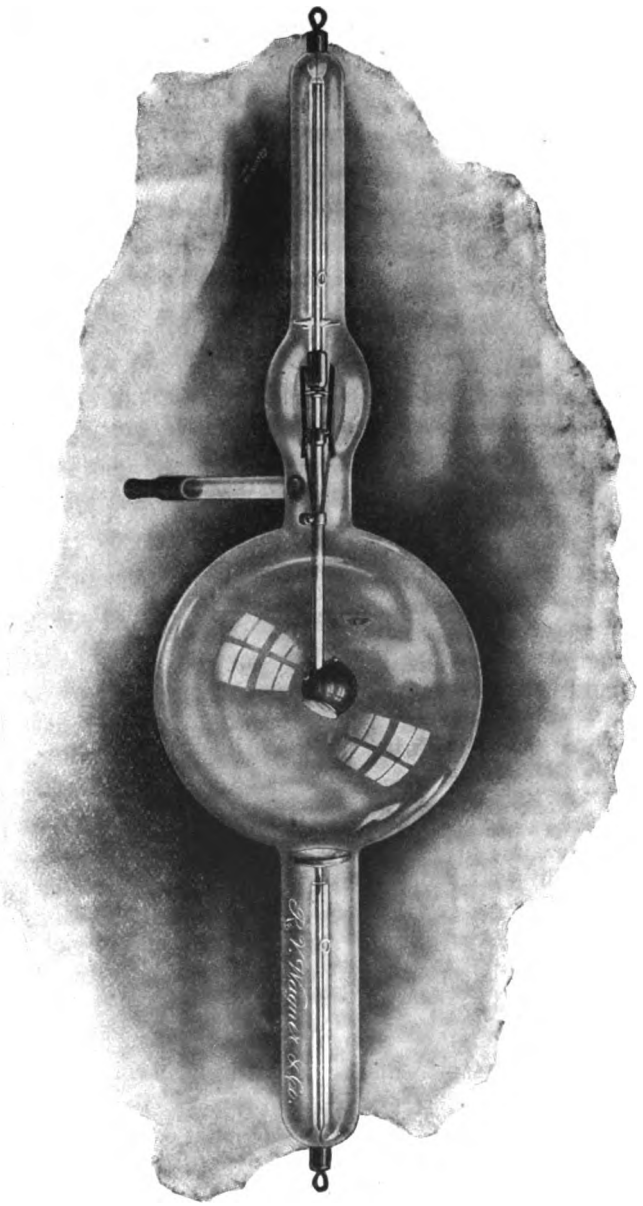


Figure 1.

In making a Crookes tube by all methods used heretofore, it has been practically impossible to get the anode the required distance from the cathode, so as to obtain a sharp focus, as the stem

Digitized by Google

supporting the anode had to be used in the glass by guess, and the tube exhausted before it could be tested, when if the anode was found defective in respect to its focus, it was too late to remedy the defect, without going to an expense nearly equal to that of making a new tube. A microscope can not be focused

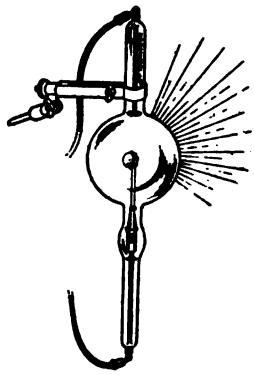
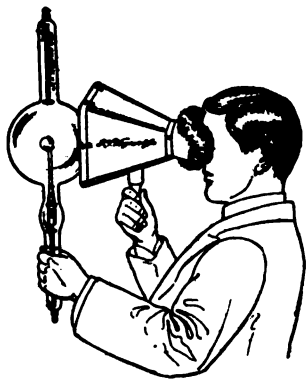


Figure 2.

accurately by a person who guesses at the distance the lenses should be from an object, without looking through them. This would be much easier, however, than to focus a Crookes tube by guess, as to the distance the anode should be from the cathode, because of the skill required on the part of the glass-blower to seal in the stem supporting the anode, so as to hold is where he



thinks it should be; his judgment of where it should be is purely guesswork because there is no way of testing, until the tube is exhausted and properly excited.

The new feature of my tube is in having the anode mounted on a threaded stem which can be magnetically operated through the glass, so as to move the anode up or down or circumferentially

Digitized by Google

with the surface of the tube, to obtain an absolutely accurate focus (Fig. 3).

The little armature on which the magnet acts can not possibly get out of adjustment, and will hold the anode in any required position, either in focus or out of focus, as the operator may desire for some therapeutic purposes.

When a cheap metal is used for the anode, it must of necessity be out of focus because it will not stand up under the strain of having the molecular bombardment confined to a very small area,

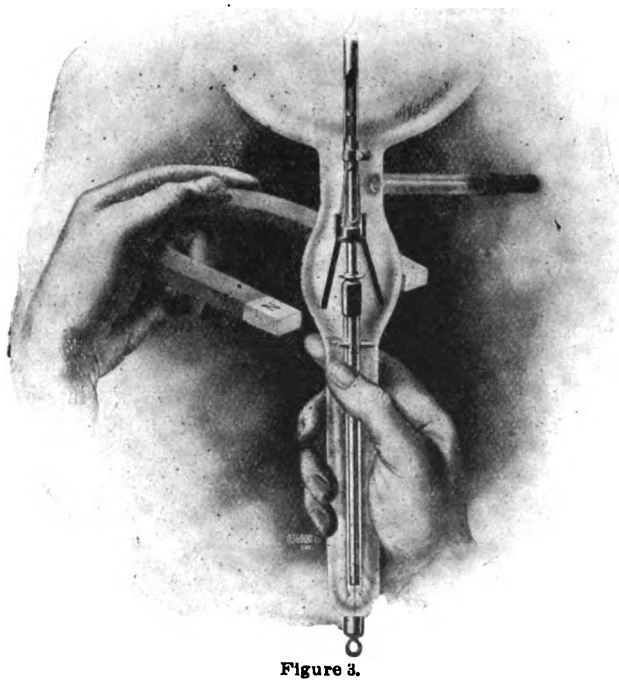


Figure 3.

as is the case when the anode is in focus. Platinum is the only metal that will do for a sharply focused anode, as it not only stands a very high degree of heat, but is not broken down by the molecular bombardment, like inferior metals, e. g., nickel steel.

In my tube the anode is completely covered by a plate of platinum made very thick at the focus. This plate of platinum is electrically welded to the metal forming the body of the anode, and will stand an unusual degree of heat, and unlimited usage, even with the sharpest focus.

With my method of magnetically adjusting the anode, it is possible to make every tube alike, and to accurately focus the same after the tube is finished and in operation just as you focus a

Digitized by Google

microscope by looking through the lenses, instead of guessing at the adjustment by observation as to the distance of the lenses.

In order to appreciate the vast difference in X-Ray work due to the proper focusing of a tube, the sharpness of definition can be carefully tested (Fig. 5) by taking an ordinary wire screen, 20 holes to the linear inch (called a 20-mesh sieve), hold the fluoroscope 24 inches away from a tube, and it will be found that with a poorly focused tube the screen will have to be brought very near the surface of the flurooscope in order that the mesh be clearly distinguished. The nearer it is necessary to bring the screen to the surface of the fluoroscope, the more the tube is out of focus; but the farther away the screen may be held and the mesh clearly distinguished, the more accurate the holes in a 20-mesh screen will stand out perfectly clear at least 12 inches away from the fluoroscope, having the fluoroscope 24 inches away from the tube.

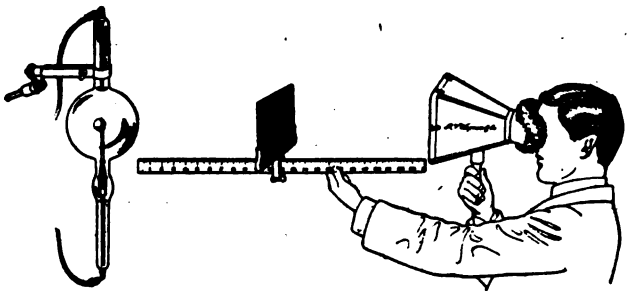


Figure 5.

A few simple tests that will enable anyone to distinguish a good tube from a bad one should be carefully considered. X-Ray workers posted on the requirements of a good tube will agree that it is more difficult to obtain a good tube today than it was a few years ago, before low-priced competition arose, and that two tubes made in appearance exactly alike, with practically the same degree of vacuum, and the same quality of glass for the bulb, will give entirely different results, on account of the difference in the focus effecting the definition in radiographic work. Every operator will find that out of a large number of tubes, as made heretofore, but one will do good work, and one that he is willing to adopt as his "pet tube."—*Journal A. M. A.*, March 26, 1904.

We have just received the two prize essays on Preventive Medicine, entitled "General Principles of Preventive Medicine," by W. Wayne Babcock, M. D., and the "Medical Inspection of Schools—A Problem in Preventive Medicine," by Louis S. Somers, M. D.,

Digitized by Google

which are published for gratuitous distribution to the medical profession by the Maltine Company, of Brooklyn, N. Y.

These essays were selected from a vast number sent in by competitors, which is a most genuine guaranty of their true worth. And it goes without saying that the profession at large should take advantage of this opportunity for enlightenment on these imporant subjects.

Gunshot Wound of the Brain.

Wyeth (*American Medicine*, February 13, 1904) reports a case of gunshot wound of the brain. The patient was seen five months after receiving the injury, and presented the following symptoms: Hole through the frontal bone about one inch to the right of the median line of the skull and about the same distance from the junction of the intraparietal with the frontoparietal suture; protrusion of granulation tissue, through which there was a discharge of pus; impairment of mind.

Radiographs, by Robertson, were taken from both sides and front and back, that from the right showing the foreign body most distinctly, while the one from the occiput did not show it at all.

The wound was cleared and a Nélatan probe introduced for a depth of three inches, finding the bullet on the orbital plate of the frontal bone. The finger was then introduced and a forceps passed along its palmar aspect and the foreign body then removed.

To secure proper drainage the skull was cut through at the level of the orbital plate of the frontal bone and drainage-tube passed into the deepest portion of the abscess cavity; a drainage-tube was also introduced through the original wound.

The delirium disappeared after three weeks, and within two months the patient was able to return to his home and resume his usual occupation, although his intelligence was slightly diminished.

Gunshot wounds of the brain which are not immediately fatal are divided into two classes: (1) Those in which the missile passes through the entire skull; (2) those in which it lodges within the cranial cavity.

In the first class the indications are to enlarge the wounds of entrance and exit sufficiently to remove all fragments and control the hemorrhage of scalp and membranes. The wound of the brain should not be plugged for fear of compression. Ligature of the extremities will decrease the intracranial pressure and can be

Digitized by Google

practiced until the bleeding ceases. A few strands of catgut passed entirely through the wound will give sufficient drainage. Should abscess occur it should be located and drained.

In the second class, if the missile is of small caliber and there is no disturbance of function, enlargement of the wound to remove loose pieces of bone and to assure the penetration of the brain is all that is necessary. If the missile is of large caliber or there are symptoms of serious injury, the wound should be thoroughly exposed and cleaned and an effort made to locate and remove the foreign body.—*Cincin. Lanc. Clinic.*

Analgesia by Lumbar Puncture.

Filippo Caccia reports the use of hydrochlorate of tropacocaine by lumbar puncture for analgesia in forty-three operations, in twenty-seven of which analgesia was complete, in eight incomplete, and in eight absent. The operative procedures were abdominal, genitourinary, anal, rectal, and in the lower extremities. In the cases in which analgesia was not present chloroform narcosis was much easier than usual. The advantages of this method are: 1. Because the patient is entirely conscious there is no need of a fixed position or of the presence of a physician immediately after the operation, as in chloroform narcosis. 2. The patient is much more quiet, and is able to assist the surgeon by changes in position. 3. Shock is less. 4. It is applicable to cases of heart, kidney, and arterial disease. 5. Ease of transportation is greater, which is especially important in military surgery. In slight operations the patient can walk a short time after the operation. 6. Economy of time. 7. Instrumentation is simpler than with chloroform. Tropacocaine is better than cocaine because it retains its power for at least twenty-four days, and can be repeatedly sterilized by boiling. Analgesia is more profound in the regions supplied by the sacrococcygeal plexus than in that supplied by the lumbar plexus.—*Giornale Medico del Regio Esercito.*

Mrs. Earle's Opinion of Doctors.

Mrs. Earle gives her opinion of doctors. The writer is not by any means enamored of the medical profession, and seizes the opportunity to pay its members several left-handed compliments. Mrs. Earle, however, it a great admirer of Dr. Alexander Haig, and of his doctrine that we should avoid all uric acid and xanthin-

Digitized by Google

containing foods, which he considers harmful, such as meat, fowl, fish, tea, coffee, cocoa, parsley, asparagus, and some other vegetables, and refrain from all alterative and purgative drugs. The writer declares that poor people in Great Britain have lost the art of feeding children. What, she asks, should be our mental attitude toward doctors, and answers by saying that we should learn from them all we can, and should help them as much as possible by perfect openness and truthfulness, and should let them benefit by our experience and common sense, and should let them know that our object is to attain a better state of general health, and not to make a sudden and rapid cure by means of medicines which only cause momentary alleviations. Mrs. Earle finds that both doctors and the public are somewhat scornful at the high-faluting moral attitude assumed by food-reformers, teetotalers, and abstainers of all kinds, and she owns to having, at one time, sympathized considerably with this point of view. She considers, however, that the knowledge one picks up in the course of life is contingent upon obedience to the whole law, physical as well as moral, and that moral obedience will not atone for physical sin and *vice versa.—British National Review.*

Scientific Aspects of Moderate Drinking.

Francis Gano Benedict declares that it is evident that individuality and physical condition play a very important rôle in determining what is commonly meant by excess. Moderation for one man may be decided excess for another. From careful research it has been determined that habitual indulgence in alcoholic liquors beyond the most moderate amounts help to shorten life proportionally to the degree of indulgence. In life insurance companies there seems to be much more importance attached to the applicant's relation to the use of alcoholic liquors now than twenty years ago. In general it may be said that alcohol diminishes all forms of mental activity. The use of moderate quantities of alcohol has a strong tendency to lead to its excessive use. The habitual use of alcohol in any amounts should be discountenanced. Special pains should be taken to show the young man that any use of alcohol, even though it be occasional, must be regarded as contrary to scientific teachings. Alcohol even in small amounts retards the physical and mental growth of youth. The habit-forming tendency of alcohol is a factor in the moderate use of alcohol that must be taken into serious consideration. It is not unreasonable to conclude that there is a real danger from the habit-forming tendency

Digitized by Google

of alcohol which should not be overlooked in any consideration of the use of alcohol.—*Boston Medical and Surgical Journal.*

Some Observations on the Application of Serum Diagnosis to Forensic Purposes.

Hauser points out that great care is necessary not only in preparing specific sera for forensic application but also that still greater experience and practice are needed in carrying out the reactions. The responsibility involved in determining these questions is so great that every medico-legal expert should acquire the training and technique required. The author describes a modified method which is done with capillary tubes instead of the usual tubes of Ziemke, and which can be made to give definite results with only fractions of a drop of the human blood solution. The author also calls attention to the danger attending too rapid forcing of the animals used in producing the serum, as in this way sera of great precipitating power are obtained that react not only with human but also with mammalian blood.—*Münchener medizinische Wochenschrift.*

A Diploma in Tropical Medicine.

The University of Cambridge has recently announced that it will grant to applicants who have fulfilled the stipulated conditions regarding time of study, and who pass successfully an examination, a diploma testifying to knowledge and skill in tropical medicine and hygiene. The examination will have reference to the nature, incidence, prevention, and treatment of the epidemic and other diseases prevalent in tropical countries. It will comprise the following subjects. 1. The methods of pathological and bacteriological investigation. The examination of the blood. The characters, diagnosis, and life history of animal and vegetable parasites. The examination, chemical and microscopic, of poisoning or contaminated foods and waters. 2. The origin, pathology, propagation, distribution, prevention, symptoms, diagnosis, and treatment of the epidemic, endemic, and other diseases of tropical climates, including malaria, blackwater fever, trypanosomiasis, relapsing fever, dengue, yellow fever, plague, tetanus, beriberi, dysentery and hepatic abscess, cholera, enteric fever, Malta fever, and specific diarrheal affections of the tropics, diseases due to cestode and other worms, filariasis, bilharzial disease, specific boils, sores, and other cutaneous affections, mycetomia, ophthalmic

Digitized by Google

affections of the tropics, affections caused by poison-cut plants and animals, and by poisoned weapons and sunstroke. 3. The general effects on health in the tropics of seasons and climate, soil, water, and food. Personal hygiene, acclimatization. Principles of general hygiene, with special reference to food and water supplies, sites, dwellings, drainage, and the disposal of refuse. The sanitation of native quarters, camps, plantations, factories, hospitals, asylums, jails, pilgrim and coolie ships. Principles and methods of disinfection. The examination will be partly in writing, partly oral, and partly practical and clinical. The clinical part will be conducted at a hospital for tropical diseases, at which cases will be submitted for diagnosis and comment. The applicant must be a legally qualified British practitioner, and must pay an examination fee of six guineas. The examination for 1904 will be held on August 9th, and the two following days.

The Haemolysins of Normal Blood Serum.

Sachs publishes the results of his last investigations, which tend to uphold the theory assailed by Gruber that the hæmolysins of normal blood serum display their activity through a combination of amboceptor and complement. He has also developed several new methods of demonstrating the amboceptors, such as activating inactive serum through homologous fetal serum which often contains only complements. Another method of separating amboceptor and complement is by the intervention of a salt concentration sufficient to prevent hæmolysis. Many amboceptors of normal serum are insufficiently found at 0° or even at 7°, and union occurs only when the amboceptor and complement have joined, after which their separation by the above method becomes impossible. In such cases the difference between amboceptors and agglutinins becomes conspicuous, since the latter are completely absorbed by the red cells at 0°, while the amboceptors remain in solution.—*Münchener medizinische Wochenschrift.*

The Gluten Flour Fraud.

The exposure, by the State Board of Health of New Hampshire, of the fraud practiced upon the purchaser of anti-diabetic gluten flour, shines forth like a good deed in a naughty world. Fourteen brands of flour made by six or seven firms, and advertised as healthful products for diabetic patients, were analyzed and found to average almost 48 per cent starch. It is a simple matter to

Digitized by Google

test the starch reaction in any flour, and a notorious fact that there are no starch-free flours to be had, but it is a surprise to find such a large percentage of starch contents in all. As a matter of fact there is less danger in permitting the diabetic patient to eat a certain prescribed amount of well baked bread or toast, than deluded with the belief that the vile bread made of gluten flour is harmless—to give him free rein with this indigestible article. No suitable substitute for bread has as yet been devised, and, least of all, are the claims made by manufacturers of these glutens to be given a hearing. The frequently existing boulimia of diabetics is additional reason why physicians should warn their patients agains the false sense of security given by a supposedly starch-free gluten flour.—*Wisconsin Medical Journal.*

The Serum Treatment of Typhoid Fever.

Einhorn goes over the work done with the anti-typhoid serum, and reports the results. He says: (1) The anti-typhoid extract is of specific therapeutic value against typhoid fever only; (2) it is a harmless preparation which can be given in large doses without any untoward effects; (3) it is an aid in differential diagnosis; (4) if given uninterruptedly in typhoid fever, it decreases the temperature and strengthens the pulse; (5) it shortens the duration of typhoid fever and diminishes or neutralizes completely the effect of the toxins of typhoid fever; (6) taken per os it naturally can not cause any such complications as sometimes result from subcutaneous injections.

He finds that while the use of the serum does not seem to materially shorten the disease, it does improve the general condition. The sensory and nervous symptoms are especially much improved, so that some grave complications, such as sleeplessness, headache, restlessness, delirium, etc., disappear entirely.

The injections do not seem to be connected with any dangers, and only in one or two cases were even slight disturbances noted.

He believes, therefore, that the serum treatment of typhoid fever is now already of decided value, but that we shall soon have more potent sera.—*Medical Record.*

Treatment of Tropical Dysentery.

Frederick Goldsmith insists upon absolute rest to the body and to the intestinal canal. The diet should be left off altogether for a time, or be wholly fluid and as little as possible. Although the

Digitized by Google

patient may be almost continuously on the stool, that which is passed is not fecal matter at all, but merely the product of a highly inflamed bowel. The fæces tend to be locked up behind the diseased part, and to be retained there by the muscular spasm of the affected portion of the bowel, the lumen of which is still further diminished by the œdema present in the mucous and submucous coats. To ensure the passage of the fæces it is necessary to render them as liquid as possible, and for this the sulphates of magnesia or soda are very suitable. The author usually gives one drachm doses every two hours, combined with a little tincture of opium, tincture of orange and chloroform water, till the motions become feculent, and then every four hours afterwards for a few days. To render the diseased bowel aseptic as far as possible, and to destroy the disease-producing germ, injections per rectum are valuable when the disease does not extend backward beyond the descending colon. Methylene blue nine grains, and boric acid solution two pints, gives the most satisfactory results. The enema should be injected slowly, and if there be still any expulsive effort, the buttocks (which are raised on a pillow) should be pressed together till the spasm passes.—*The Australasian Medical Gazette.*

Artificial Feeding of Infants.

Hutchinson gives his experience in the treatment of children. The statement is made that the basis of all attempts at artificial feeding must be cow's milk. The drawback to cow's milk is the indigestibility of the casein. We can overcome the quantitative by diluting the milk, but this does not affect the chemical character of the casein. Hence it is that no artificial humanized milk can ever be really as digestible as that of the child's mother. The writer says that barley water has certain advantages as a dilutent, but if there is a tendency to diarrhea or scalding under the napkin, lime water is preferable. To be of any use the lime water must be used freely. A teaspoonful or two, which mothers often add to the bottle of milk, is of no value. To increase the sugar, lactose is used, but if not obtainable, white sifted cane sugar may be used. Brown sugar is to be avoided, as it ferments more easily. Feeding should be regular. In warm weather, milk should be boiled not more than one or two minutes. There is no doubt that boiling milk increases the risk and produces scurvy. Poor results in the artificial feeding of infants are often due to the aperture of the nipple used. It should be of such a size that

Digitized by Google

it will drop, when the bottle is inverted, about a drop per second. When infants are doing poorly, attention to this point is often all that is needed. The baby should gain five or six ounces per week. —*Medical Lancet.*

Backward Luxation of the Hip Joint—A New Method of Reduction.

Elgart describes a case of backward luxation of the hip-joint in which the ordinary methods of reduction had failed. He thereupon laid the anesthetized patient on the floor and had an assistant fix the pelvis by pressure on the iliac spines. Then, kneeling on one knee, the operator laid the dislocated extremity over his other knee, grasping the patient's ankle with one hand so that the lower leg served as a lever. By making downward pressure on the lower leg, a powerful traction was exerted upon the femur in a vertical direction. Inward rotation of the femur was secured during the above traction by turning the lower leg outward, while with the other hand the operator grasped the prominent luxated head of the femur and pressed it outward in order to facilitate the passage of the same over the lip of the acetabulum. The same object can be obtained in a corpulent individual by making outward action on the proximal end of the femur. Adduction might also be obtained during this maneuver by the operator bending his knee forward, although this was not necessary in the author's case. Reduction was accomplished at the first attempt by this method. A word of caution might be given in regard to the danger of producing a fracture of the bones of the leg or of the neck of the femur, or of rupturing the capsule of the knee-joint—*Centralblatt für Chirurgie.*

Books and Magazines.

Obstetrics for Nurses. By Joseph B. DeLee, M. D., Professor of Obstetrics in the Northwestern University Medical School, Chicago; Lecturer in the Nurses' Training Schools of Mercy, Wesley, Provident, Cook County, and Chicago Lying-in Hospitals. 12mo of 460 pages, fully illustrated. Philadelphia, New York, London: W. B. Saunders & Company. 1904. Cloth, $2.50 net.

Though written for nurses, this work is almost a text-book on obstetrics. Surely the nurse who masters the details will be much

Digitized by Google

more competent to practice midwifery than a vast number of so-called midwives and out-of-date obstetricians. The work is really intended not to teach the nurse to supplant the physician but to see the preparation of all details before the arrival of the physician, and to treat emergencies. With this purpose in view, it has been written with great attention to details, and very specific directions. The text is very much simplified by profuseness of illustrations. The cuts are good and represent the ideal conditions which the nurse may not depart from except in cases of absolute necessity. Especially do we wish to call attention to the diagrams for the preparation of the room, bed, table, etc., for confinement. The work is entirely a satisfactory one, and doubtless will do much toward making conditions for labor popular.

A PRACTICAL TREATISE ON NERVOUS DISEASES FOR THE MEDICAL STUDENT AND GENERAL PRACTITIONER. By F. Savary Pearce, M. D., Professor of Nervous and Mental Diseases in the Medico-Chirurgical College; Fellow of the College of Physicians, Philadelphia, etc. Colored frontispiece. Ninety-one illustrations in the text, many in colors. New York and London: D. Appleton & Co. 1904.

This work partakes of the nature of series of studies into the practical points in diagnosis and treatment of nervous diseases. The subject in such a vast one, and knowledge of it is so necessary to the general practitioner and student of medicine, that there is a constant need for simpler methods of study than those hitherto in vogue. The chapter on anatomy and physiology of the nervous system is wisely made to introduce the student into the mazes of symptomatology which is soon to follow. The work is profusely illustrated by well chosen and useful pictures, which are a great help in diagnosis. The entire work is well suited to professional use.

THE PRINCIPLES AND PRACTICE OF HYDROTHERAPY—A GUIDE TO THE APPLICATION OF WATER IN DISEASE FOR STUDENTS AND PRACTITIONERS OF MEDICINE. By Simon Baruch, M. D., Professor of Hydrotherapeutics in the New York Post-Graduate Medical School and Hospital, etc. Second edition, revised and enlarged with numerous illustrations. New York: William Wood & Co. 1903.

Up to comparatively recent times all hydrotherapeutic measures were based upon empiricism. It is entirely due to the efforts of modern investigation, however, on lower animals, that we can draw any sound deduction from the effect of hot, cold and medi-

Digitized by Google

cated water upon the animal organism. The extensive experiments of the author along just such lines certainly places him at the head of teachers on the subject. This work embodies the essential deductions of his work with his practical observations on not only this but the author's extensive experience with water in the treatment of disease makes him an authority. This work embodies the essential features of his experience, and his deductions are of the most practical and scientific character. This is a growing science and one in which the profession is interested owing to its wide application. It gives us pleasure to recommend the above work, not only to the student but to the general practitioner.

ARTERIA UTERINA OVARICA, THE UTERO-OVARIAN ARTERY OR THE GENITAL VASCULAR CIRCLE, ANATOMY AND PHYSIOLOGY, WITH THEIR APPLICATION IN DIAGNOSIS AND SURGICAL INTERVENTION. By Byron Robinson, B. S., M. D., Chicago, Ill.; Author of Practical Intestinal Surgery, etc.. Published by E. H. Colegrove, Chicago.

This work partakes of the nature of a diagramatic chart, presenting the relation of the uterine and ovarian arteries to the other pelvic and other abdominal structures. One hundred and seventeen illustrations are presented giving every phase of recognized variation of relation and the relations of the arteries from every possible plane. The so-called arteria uterina-avarica is described by the author as forming with the abdominal aorta the so-called circle of Byron Robinson. The illustrations are accompanied by sufficient text to explain the full value and indicate the points in pelvic operations which the author has found to be of service from his long experience. In fact the book is filled with practical suggestions which the text and the illustrations make mutually clear. We believe that a careful study of this book will be of great advantage to men doing work along this line, and we cheerfully recommend it to them.

BACTERIA, YEASTS AND MOLDS IN THE HOME. By H. W. Conn, Ph. D., Professor of Biology in Wesleyan University, Middletown, Conn.; Author of Agricultural Bacteriology, Bacteria in Milk and its Products, the Study of Germ Life, the Method of Evolution, etc. Boston, U. S. A., and London: Ginn & Company, Publishers. The Athenæum Press. 1903.

The time is soon coming when household economics will be a science, and columns in the weekly household journals will give

Digitized by Google

place to thoroughly up-to-date scientific books. The little work in hand is a pioneer in its cause. When a housewife knows the laws that govern the growth of the yeast plant, the lactic acid bacillus, and the various molds, she will be in a position to utilize the one and prevent the growth of the other to the accomplishment of very practical ends. The methods of using the various household articles, such as salt, spices, peppers, ice, etc., are fully explained, and the method of drying, preserving and canning fruits, etc., are based on actual laboratory experiments. A work of the kind is as far ahead of the ordinary receipt book as the railway train is ahead of the ox wagon.

THE PRACTICAL CARE OF THE BABY. By Theron Wendell Kilmer, M. D., Associate Professor of Diseases of Children in the New York School of Clinical Medicine; Assistant Physician to the Out-Patient Department of the Babies' Hospital; Attending Physician to the Children's Department of the West Side German Dispensary, New York. 12mo. Pages xiv-158, with 68 illustrations. Extra cloth, $1.00 net, delivered. Philadelphia: F. A. Davis Company, 1914-16 Cherry Street, Publishers.

It is with particular pleasure that we introduce this little book to our readers. Notwithstanding the fact that babies are so common, it is a rare thing indeed that a household is prepared for the advent of the little strangers when they come. Everybody wants to assist him, but few people really know how. This is exactly what the little work teaches. What is particularly commendable about it is the comparative number of illustrations of the details of baby care that are shown. The methods of feeding, of taking up a baby, of clothing it; the particular style of nipple that is best, the exact sort of flow it should give; all these may seem minor points, but they can not be conveyed so faithfully through a description as by a picture. All of these are so well illustrated that with ordinary care one can not neglect the essential points. We most highly recommend this little book on its mission of good.

HOW TO ATTRACT AND HOLD AN AUDIENCE.—A Popular Treatise in the Preparation and Delivery of Public Discourses. By J. Berg Esenwein, A. M., Lit. D., Professor of the English Language and Literature, Pennsylvania Medical College. Price, $1.00 postpaid. Hines & Noble, Publishers, 31 to 35 West Fifteenth Street, New York City.

We very seriously doubt whether this book or any other book would enable a man not born to the art to attract or hold an audi-

Digitized by Google

ence, but we really and sincerely believe that much can be done for the novice in the art by a work of this character, especially in giving the self confidence necssary for the task. This we consider the strong point of the book. Especially do we want to mention the chapters on the "Nature of Public Speech." "How to Acquire an Oratorical Vocabulary," and "Facing the Audience," as having in them many practical points for young or inexperienced speakers. Appendix B gives a number of outline orations for various occasions, which may be useful for the beginner.

SAUNDERS MEDICAL HAND ATLASES—ATLAS OF THE EXTERNAL DISEASES OF THE EYE. By Prof. Dr. O. Haab, of Zurich. Second edition, thoroughly revised. Edited, with additions, by G. E. De Schweinetz, A. M., M. D., Professor of Ophthalmology in the University of Pennsylvania. With 98 colored lithographic illustrations on 48 plates, 232 pages of text. Philadelphia, New York, London: W. B. Saunders & Company. 1903. Price, $3.00 net.

This new work of Dr. Haab's forms an excellent companion to his "Atlas of Ophthalmology and Ophthalmoscopic Diagnosis," and both are indeed very creditable works. The book is built on a plan of clinical work. The author, as it were, leading the student from a typical case of one-eye disease to that of another, explaining the symptoms, diagnosis and treatment as he goes. Instead of the actual patient, the author furnishes excellent colored lithograph illustrations of the diseases in question, thus making the best substitution possible. This edition will undoubtedly meet with the approbation of the profession as the former has done.

DISEASES OF THE INTESTINES—A Text-Book for Practitioners and Students of Medicine. By Max Einhorn, M. D., Professor of Medicine at the New York Post-Graduate School and Hospital, and Visiting Physician at the German Hospital, New York. Second revised edition. New York: William Wood & Co. 1904.

The first edition of this work enjoyed, we believe, the distinction of being the first English monograph upon the subject of intestinal diseases published. Since then a few others have come out, and though good, we believe we know of none which surpass this one. In this the second edition much new matter has been added, especially on the subject of appendicitis, hemorrhoids and acute obstruction. The work contains a number of microscopic charts representing stools of patients suffering from intestinal diseases, which are very instructive. The author is an authority on

Digitized by Google

diseases of this character, enjoying more than a national reputation, and he has kept closely in touch with the distinguished German writers Nothnagel, Boas, Ewald and Fleischer, as well as with the English, Fowler and Treves. We take pleasure in recommending the work, for it is one that we perused with pleasure.

NON-SURGICAL TREATISE ON DISEASES OF THE PROSTATE GLAND AND ADNEXA. By George Whitfield, A. B., M. D., formerly Professor of Physiology in Memphis Hospital Medical College, Published by Marsh & Grant, Chicago.

The author takes a distinct stand against indiscriminate use of the knife in diseases of this character, and, while admitting that there are many diseases in which surgery is necessary, he claims that the majority are successfully treatable by the proper application of medicines, electrolysis and cataphoresis. The author's results in the large number of cases which he has handled, are certainly conducive to conservative measures. The book is of neat style and finish, and contains some excellent, though unfortunately, a scanty number of illustrations. This is a work which is to the interest of every general practitioner to read.

A MANUAL OF PRACTICE OF MEDICINE, PREPARED ESPECIALLY FOR STUDENTS. By A. A. Stevens, A. M., M. D., Professor of Pathology in the Woman's Medical College of Pennsylvania, etc. Sixth edition, revised and enlarged. Illustrated. Price, $2.50.

This work, now in its sixth edition, is indeed a valuable and practical hand-book for a rapid review of the subject. Its ideas are gotten from the greatest men in the field of medicine, and though short, its articles are thoroughly scientific and up to date. Much new matter has been added in this last edition, particularly on the subject of malarial fever, yellow fever, neurasthenia, diseases of the cord, etc. The student will find it invaluable for a hasty preparation for a medical board examination.

A CHART OF ACUTE POISONING, GIVING DESCRIPTION, CLASSIFICATION, WITH SPECIAL SYMPTOMS, ANTIDOTES, FATAL DOSES, SIMPLE TESTS, ETC. Victor Koechl & Company, H. A. Metz, President, 122 Hudson, Street, New York.

Every doctor should write to the above address and secure this little wall chart for his office. The work is gotten upon an ideal plan, and is very efficient for ready and quick reference. We desire to thank the above named profession on behalf of the profession for their thoughtfulness in arranging and sending this little work out.

Digitized by Google

-ROYAL-

Baking Powder.

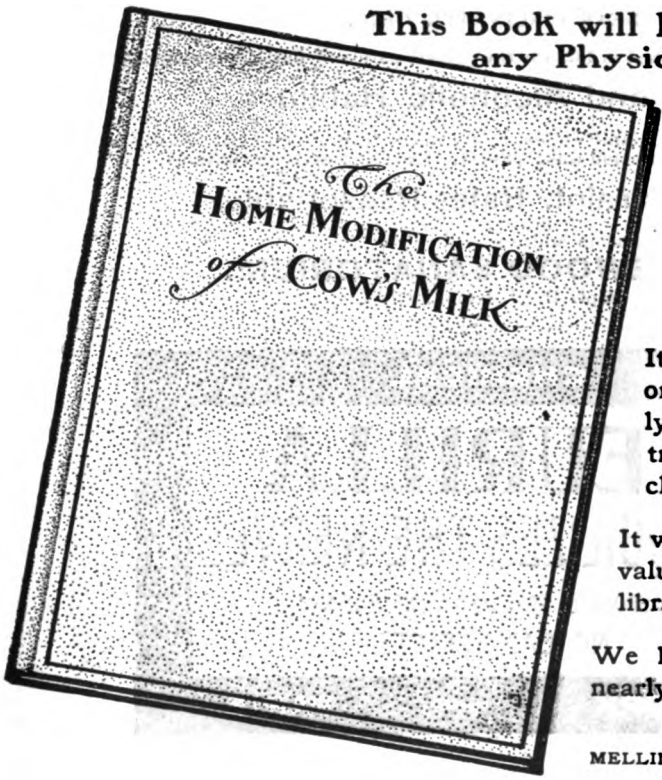
INDISPENSABLE FOR PURE AND WHOLESOME FOOD.

Royal Baking Powder is made from cream of tartar, a product of the grape, and the most healthful of all fruit acids.

Royal Baking Powder vesiculates the dough by mechanical means, without fermentation, and in no way affects or changes the constituents of the flour. There is no destruction of the gluten or sugar, but all those elements are preserved which are intended by nature, when combined in our bread, to make it literally "the staff of life."

Fresh bread, cake, biscuit, griddle-cakes, etc., raised with Royal Baking Powder, may be eaten with impunity by persons of dyspeptic tendencies or the most sensitive stomachs.

Food for the sick requiring to be leavened is made perfectly wholesome and more nutritious by the Royal Baking Powder than by any other vesiculating agent.



This Book will Be sent FREE to any Physician on Request.

In it the various details of scientifically preparing cow's milk for an infant's digestion are discussed and many formulas given.

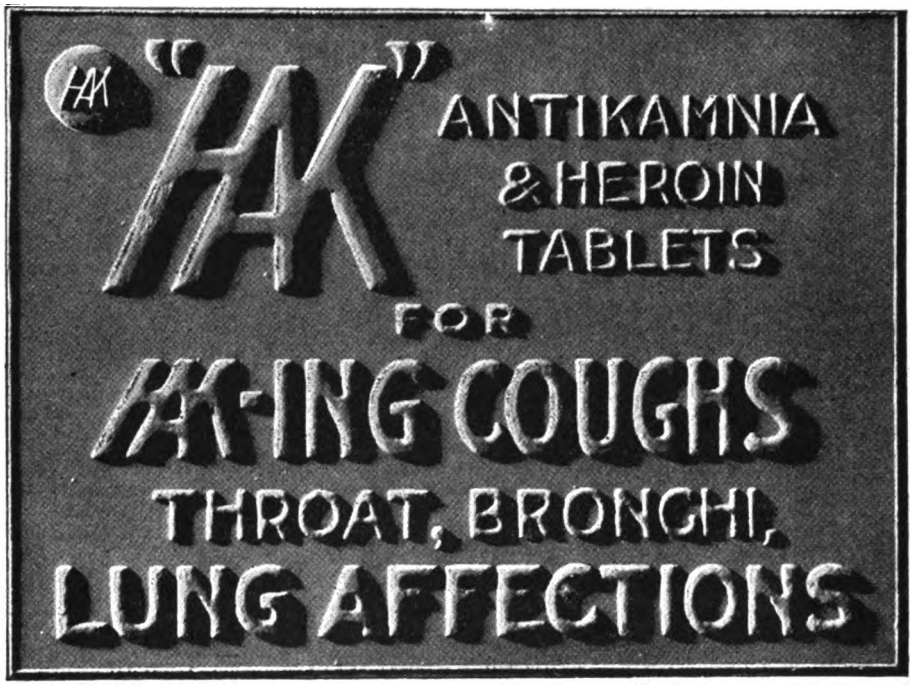
It is printed in two colors on fine paper, is fully and beautifully illustrated and bound in full cloth.

It will make a useful and valuable addition to your library.

We have already supplied nearly 75,000 physicians.

MELLIN'S FOOD CO., BOSTON, MASS.

Digitized by Google



MAPLEWOOD

NEAR CINCINNATI, OHIO.

A Sanatorium established in 1875 for the private care and medical treatment of

Drug and Alcoholic Habitues.

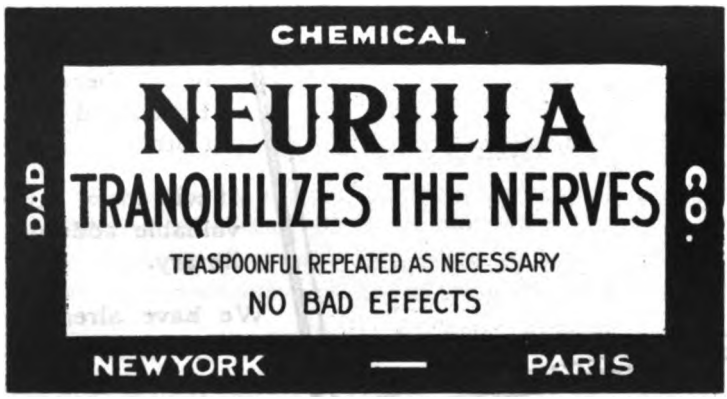
Beautifully located in the Miami Valley, thirty miles from Cincinnati. Easily accessible by train. Location unsurpassed. Excellent accommodations.

No Restraint. Rates Reasonable.

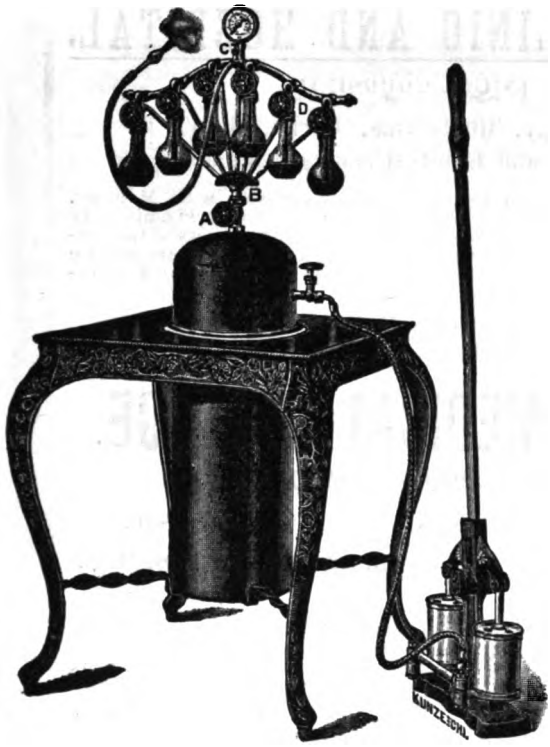
For terms and full information address,

MAPLEWOOD SANATORIUM,

Dept. 41, Lebanon, Ohio.



Digitized by Google



THE

EUREKA NEBULIZER

"THE LATEST UP-TO-DATE"

The most practical and successful "NEBULIZER" in use in treatment of Bronchitis, Tuberculosis, Catarrh, Asthma, Hay Fever and Catarrhal Deafness by dilation of the Eustachian tube, and medicated massage of the Middle Ear.

Thousands in Use. They Give Universal Satisfaction.

The EUREKA is the most perfect Nebulizer in construction and finish, is easy to manipulate, and Physician is not annoyed by its getting out of order. Satisfaction guaranteed or money refunded. Write for descriptive Circulars showing twenty different styles.

(Sold by dealers in Physicians' Supplies.)
Address,

THE EUREKA NEBULIZER,

Corner Franklin and Michigan Streets
CHICAGO.

Sold by The W. S. Kirby Co., Dallas, Texas.

WHEN PRESCRIBING IN DIPHTHERIA

Kindly remember that we will give prompt attention to orders for Diphtheria Antitoxin prepared at the biologic laboratories of

Dr. H. M. Alexander & Co.,
MARIETTA, PA.,

Ready for Use in a Convenient and Aseptic Container.

Each package is guaranteed to contain a greater number of units than is indicated on the label.

WRITE US FOR PRICES.

Digitized by Google

CHICAGO POLICLINIC AND HOSPITAL.

SPECIAL CLINICAL COURSE IN

Surgery, Gynaecology, Obstetrics, Dermatology, Orthopedics, Rectal and Genito-Urinary Diseases.

Our regular annual special course in the above branches will begin Monday, April 11, 1904, and continue for three weeks. The work will be clinical and eminently practical and will be supplemented by representative clinics by members of the faculty in other branches, making it of great value to the practitioner. There will be evening lectures, and special work in the Anatomical and Pathological Laboratories. For programs and full information, address:

M. L. HARRIS, M. D., Secretary,
174-176 E. Chicago Ave., Chicago, Ill.

THE ILLINOIS MEDICAL COLLEGE,

CHICAGO SUMMER SCHOOL OF MEDICINE.

DEPARTMENTS OF MEDICINE AND PHARMACY.—CO-EDUCATIONAL.

HEMAN H. BROWN, M. D., President.
B. BRINDLEY EADS, M. D., Dean.

The Academic year is divided into four (4) terms of three (3) months each Course consists of four (4) years minimum attendance of seven (7) months each.
Buildings new. Laboratories all newly equipped. Hospital in building, thus affording student the benefit of bed-side teaching. Over 5000 clinical out-door patients treated last year. For Catalogue address

DR. W. C. SANFORD, Secretary,
182-188 Washington Blvd., Chicago.

THE TEXAS SCHOOL FOR IMBECILES AND DEFECTIVES.

AUSTIN, TEXAS.

Kindergarten, Manual and Industrial Training. Phonetics. Mental Development Through Motor Activity.

MRS. E. MOORE-BARRETT.

Physicians find many children suffering from eccentricities, nervous and physical defects, arrested development, and various mental infirmities, which render them unfit for normal life and not amenable to ordinary modes of school life. A special training adapted to their individual needs and conditions would in most cases remove the cause of the disability and in all so ameliorate the conditions as to allow the child to acquire the physical, mental and moral habits necessary to meet the vicissitudes of life, which is the object of all education. Such training and instruction can be found with Mrs. Barrett, whose long and successful work with defectives has gained for her the endorsement of the leading physicians, ministers, and educators of this city.

"As reliable in Dyspepsia as Quinine in Ague."

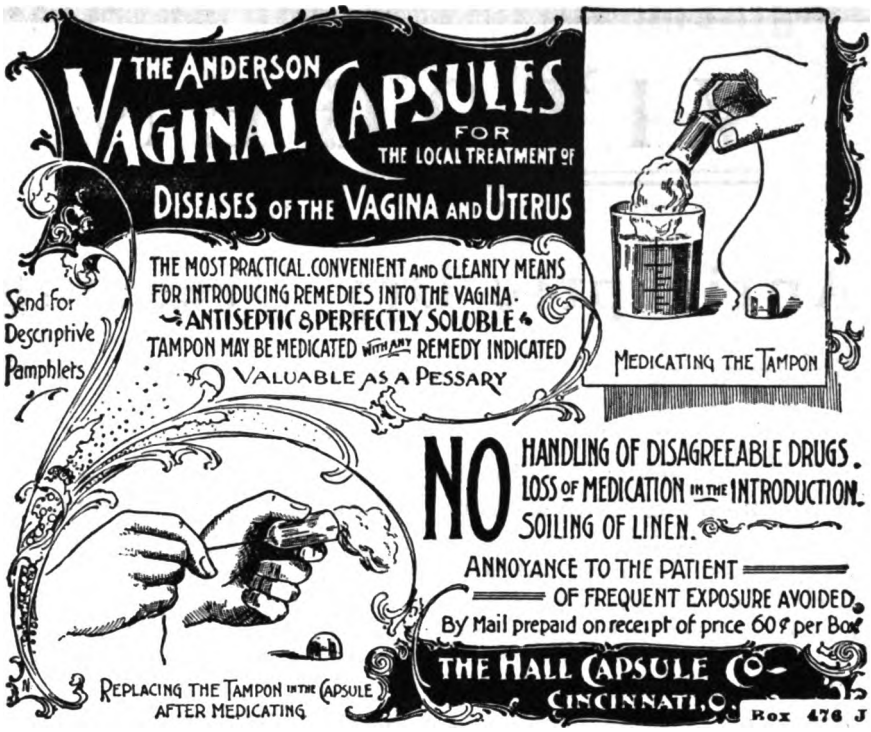
Wheeler's Tissue Phosphates.

Secures the largest percentage of improvement in Tuberculosis and wasting diseases, by maintaining the perfect digestion and assimilation of food. For forty years the standard Tonic and Reconstructive wherever Iron is indicated. Delicious and never palls on the patient.

T. B. WHEELER, MONTREAL, CANADA.

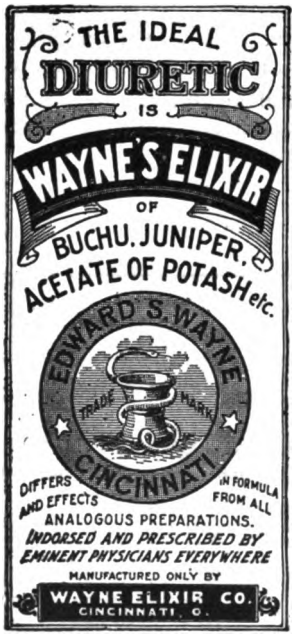
To prevent substitution, put up in pound bottles at ONE DOLLAR.
Send for pamphlet on the Phosphates in Therapy.
Free samples no longer sent.

Digitized by Google


THE ANDERSON
VAGINAL CAPSULES
FOR
THE LOCAL TREATMENT OF
DISEASES OF THE VAGINA AND UTERUS
THE MOST PRACTICAL, CONVENIENT AND CLEANLY MEANS
FOR INTRODUCING REMEDIES INTO THE VAGINA.
ANTISEPTIC & PERFECTLY SOLUBLE
TAMPON MAY BE MEDICATED WITH ANY REMEDY INDICATED
VALUABLE AS A PESSARY
Send for
Descriptive
Pamphlets
MEDICATING THE TAMPON
NO HANDLING OF DISAGREEABLE DRUGS.
LOSS OF MEDICATION IN THE INTRODUCTION.
SOILING OF LINEN.
ANNOYANCE TO THE PATIENT
OF FREQUENT EXPOSURE AVOIDED.
By Mail prepaid on receipt of price 60¢ per Box
REPLACING THE TAMPON IN THE CAPSULE
AFTER MEDICATING
THE HALL CAPSULE CO.
CINCINNATI, O.
Box 476 J

☞ Send 15 cts. for sample of 100 Ruby Capsules, and a Vest Pocket Dictionary of Medical Terms.

Wayne's Diuretic Elixir



Is the Best and Safest in the Treatment of

Urinary Calculus, Gout, Rheumatism, Bright's Disease, Diabetes, Cystitis, Haematuria, Albuminuria and Vesical Irritations Generally.

DR. CHAS. KELLY GARDNER, of West Virginia, in a recent letter, writes:

I anticipate as positive results when administering it as I do from Opium for pain or Quinine for intermittents.

IT HAS BEEN IN CONSTANT USE BY THE BEST PHYSICIANS FOR 22 YEARS.

Try it, Doctor. Allow No Substitution,

PREPARED ONLY BY

Wayne Elixir Company,

200 East Fifth Street, CINCINNATI, OHIO.

Digitized by Google

VITOGEN

Antiseptic Dry Dressing

Non-Irritating Non-Odorous Non-Toxic

Far superior to iodoform, costs only half as much and leaves no disagreeable odor. Stimulates tissue formation. Indicated in all cases where a dry dressing is preferable. Now in use by over 40,000 physicians. Dispensed by prescription druggists in 2-oz and 4-oz sprinkle-top bottles, or can be obtained by mail from the manufacturers.

Saratoga Ointment

Germicide and antiseptic but does not interrupt granulation. A perfect lubricant, vehicle and ointment. Never spoils or becomes rancid. Appearance, feel and odor are exceptionally fine. Results exceedingly satisfactory. 60c per lb. 12 1-oz cans, 75c.

Unguentum Gynecol

Extremely useful in treating cervical affections and all uterine ulcerations, inflammations, congestions, discharges and irritations. Affords quick relief for acute ovarian, uterine and vaginal pains. Acts as a sedative upon the entire nervous system.

Samples and Literature Free to Physicians

THE G. F. HARVEY CO.,

SARATOGA SPRINGS, N. Y.

PITTSBURG, PA. PEORIA, ILLS. MILLE ROCHES, ONT.

Digitized by Google

American Alkalometry Wins

For years we have been urging research in exact therapeutics—encouraging the doctor to demand and strive for a dependable pharmacy. To this end we have lent our best endeavor, and in Alkalometry we join in success, the busy doctor having found at our Alkaloidal Laboratories what he wants.

While we have developed a general line of single active-principle medicaments, certain great phases of the subject of exact medication have crystallized themselves into definite specialties which as leaders we present for the consideration of every practician, knowing that he will find them right.

Calcidia, for Croup, Etc.

(Iodized Calcium.)

This incomparable preparation of lime and iodine, as "iodized calcium," or erroneously, "iodide of lime," has been before the profession for some years, and its friends are legion.

Indications: Croup and all non-specific exudative affections, La Grippe, bronchitis, phthisis, glandular affections, etc. It is simply a marvel.

Per single package..... .....$ .50
Per dozen 5.00

Calcalith—for Uricacidemia.

(Calcium Carbonate Comp.)

This is a uric-acid remedy that may be depended upon. It really does things, as any man can prove for himself. It is based on the carbonates of lime and lithium with colchicine.

The encomiums coming from the profession are very positive and encouraging.

Indications: All manifestations of the uric-acid diathesis, phosphaturias, etc.

Per single package..... .....$ .80
Per dozen..... ..... 9.00

Saline Laxative and Salithia.

(Efferv. Magnesium Sulphate Comp.)

These two preparations are C. P. Magnesium Sulphate in effervescent combination: the latter differing by reason of the addition of colchicine and lithium and carrying less magnesium sulphate. As eliminants they are unexcelled, the one as a general laxative, the other where the secreting glands require stimulation.

Saline Laxative, per package.....$ .35
Per dozen..... 4.00
Salithia, per package..... .55
Per dozen..... 6.00

Intestinal Antiseptic (W-A).

(Sulphocarbolates Comp.)

The great importance of Intestinal Antisepsis is becoming daily more obvious to the medical mind; and it is generally conceded by those who, through experience are competent to judge, that, as an intestinal antiseptic our Compound Sulphocorbolates—Intestinal Antiseptic (W-A), stand without a peer. They are absolutely non-poisonous, positively efficient and low in price.

Standard Tablets: 100, 35c.; 500, $1.40: 1,000, $2.75.

TEXAS MEDICAL NEWS COUPON.

CLIP and MAIL THIS COUPON with ONE DOLLAR and we will send you, once only, a full size package of each, post-paid—**your money back if not satisfied**; and if you are not on our customer list, and so request, will send you general samples and literature as well.

THE ABBOTT ALKALOIDAL CO.

These and others of our Specialties, as well as representatives of our general line of active principles ready for the doctor, are in stock with all leading jobbers and most principal retailers, or may be obtained direct from our laboratory. Samples, list and literature will be sent on request.

The Abbott Alkaloidal Company,

RAVENSWOOD STATION, CHICAGO.

50 West Broadway, New York.

Down Town Office, Trude Bldg., Chicago.

13 Phelan Building, San Francisco.

Digitized by Google

Lac-Bismo

We confidently recommend **LAC-BISMO** in the following combinations.

For Diarrhea, Dysentery, etc.

℞ Tr. Opium, deod.....320 min.
Lac-Bismo.....q. s. 4 ozs.
M. Sig.....One teaspoonful as directed.

For Atonic Dyspepsia, Catarrhal Dyspepsia, Intestinal Dyspepsia, Fermentative Dyspepsia, etc.:

℞ Lac-Bismo.....2 ozs.
Elix. Lact. Pepsin.....2 ozs.
M. Sig.....One teaspoonful between meals as directed.

Also try the following for the same complaints:

℞ Lac-Bismo.....2 ozs.
Elix. Lact. Pepsin.....1 oz.
Lister's Antiseptic Solution.....1 oz.
M. Sig.....One teaspoonful between meals as directed.

For Summer Diarrhea, Dysentery, Intestinal Hemorrhages, etc.:

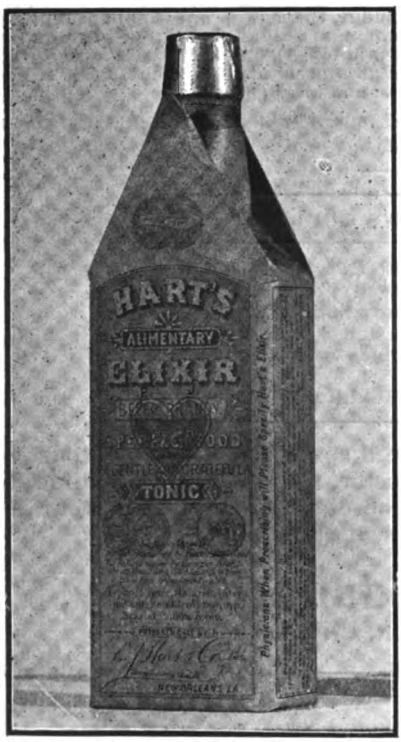
℞ Tr. Catechu.....2 ozs.
Lac-Bismo.....2 ozs.
M. Sig.....One teaspoonful as directed.

For Flux, Intestinal Hemorrhages and as Injection in Catarrhal conditions:

℞ Tr. Kino.....1 oz.
Lac-Bismo.....3 ozs.
M. Sig.....One to two teaspoonfuls, as directed.

For Intestinal Dyspepsia, Jaundice from Catarrh of the Duodenum, Diarrhea, etc.:

℞ Tr. Rhubarb.....2 ozs.
Lac-Bismo.....2 ozs.
M. Sig.....One to two teaspoonfuls, as directed.



Hart's Alimentary Elixir

A PERFECT LIQUID FOOD

Hart's Alimentary Elixir is a perfected Liquid Food composed of Beef and Brandy pleasantly blended with select and stimulating Aromatics. It contains the osmazome, fibrin, albumin and peptones together with all the stimulating juices and salts found in choice lean beef. It thus combines the savory, nutritious and blood building principles which are essential to the prolongation of human vitality.

There are times when it is necessary to keep the patient alive on stimulants alone. In these cases **Hart's Alimentary Elixir** is particularly valuable as it possesses, besides the stimulant, the essential ingredients of the blood in a readily assimilable form. The therapeutic value of this preparation is thus apparent.

E. J. HART & COMPANY

LIMITED

535-537 TCHOUPITOULAS ST.

NEW ORLEANS . . LOUISIANA

Digitized by Google

POST-GRADUATE MEDICAL SCHOOL OF CHICAGO,

2400 DEARBORN STREET.

W. Franklin Coleman, M. D., Prest. **Arthur R. Elliott, M. D., Vice-Prest.**
W. L. Baum, M. D., Treasurer. **G. P. Head, M. D.**

SPECIAL OFFER.

THERE will be actual clinical work, beginning each day at 9 o'clock a. m. and continuing until 6 o'clock p. m. Didactic lectures evenings upon such special topics as the class may desire. The clinical material in all departments is very abundant, and you examine, diagnose and treat these cases under the supervision of the professor in charge. Classes are small, thereby giving you individual instruction.

We have a hospital in the same building. The operating rooms have been so arranged that you are near enough to the operator to observe the most minute operations. The members of our faculty attend their clinics in person, and you will be kept busy all day in our own building.

We are located in the medical center and can, if you desire, give without extra fees the opportunity of witnessing the work of the best operators of Chicago in some ten of the leading outside hospitals.

Fee for General Course for one month, $55.00. (This amount includes matriculation fee, which is good for life.)

Prof. F. Robert Zeit gives special Practical Courses on Pathology and Bacteriology.

An unsurpassed Course in Surgical Anatomy and Operative Surgery on the Cadaver is conducted by Prof. R. C. Turck, in a building erected for this special work.

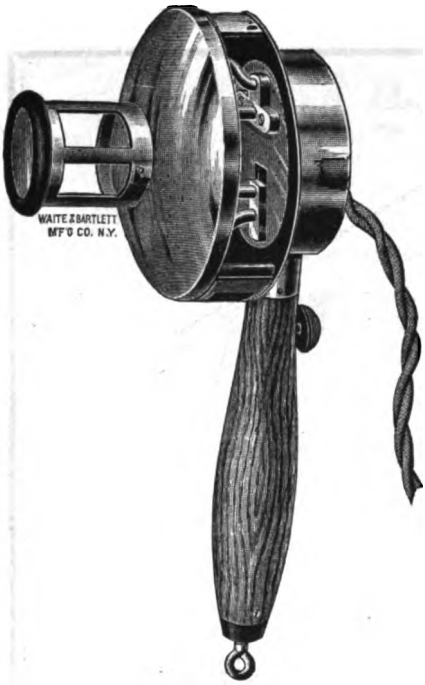
Special classes are formed for Intestinal Surgery on Dogs.

For complete information regarding our School send for Illustrated Bulletin No. 8.

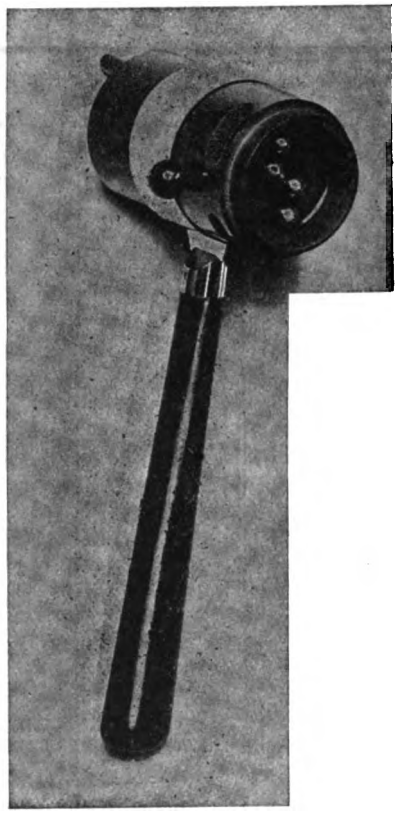
THE POST-GRADUATE MEDICAL SCHOOL,

FRANKLIN H. MARTIN, M. D., Sec'y, - 2400 DEARBORN ST., CHICAGO.

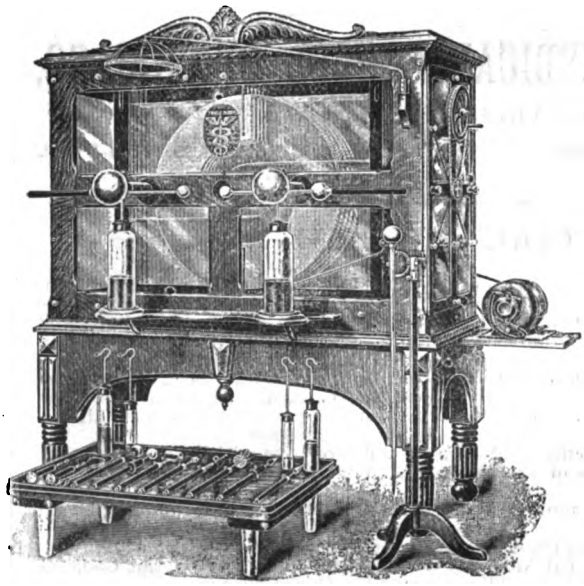
Digitized by Google



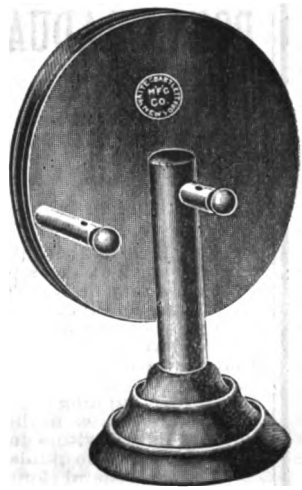
DR. PIFFARD'S HAND ARC LAMP FOR PHOTO-THERAPY.
Can be used on any 110 direct current lighting circuit. No water cooling necessary.



DR. PIFFARD'S ULTRA VIOLET RAY LAMP.
For use on Static Machine or X-Ray Coil.



TWENTIETH CENTURY STATIC MACHINE.



DR. PIFFARD'S
HIGH FREQUENCY SPIRAL.
For use with
Static Machine.

Waite and Bartlett Mfg. Co.,

217 East Twenty-third St., NEW YORK,

Manufacturers of Static Machines, High Frequency Current Apparatus, X-Ray Coils, and all Kinds of Electro-Medical and Electro-Surgical Instruments.
Send for Catalogue.

Digitized by Google

THE ROBERTS-HAWLEY
LYMPH-COMPOUND
GOAT LYMPH-ORCHITIC FLUID COMP.

The Only Direct Cell Tonic
Thus Far Discovered

Thousands of Well-Known Physicians Write of It as being

The Greatest Discovery in Chronic-Disease Therapy

INDICATED IN CHRONIC DISEASES DUE TO DEGENERATION, MALNUTRITION AND CHRONIC INFECTION, NOTABLY, LOCOMOTOR ATAXIA, ARTERIAL SCLEROSIS, HEMIPLEGIA, CHRONIC JOINT RHEUMATISM AND TUBERCULOSIS.

A SPECIFIC IN NEURASTHENIA

Send for Formula, Physiological Action, Reprints, Statistics, etc.

THE NEW ANIMAL THERAPY COMPANY
509 STEWART BLDG. STATE & WASHINGTON STS. CHICAGO

SENG

A Palatable Preparation of PANAX SCHINSENG in an Aromatic Essence

It promotes Normal Digestion by encouraging the flow of Digestive Fluids
It is the Modern and Most Successful Treatment for

INDIGESTION

A full size bottle, for trial, to physicians who will pay express charges

DOSE: One to two teaspoonfuls three times a day

CACTINA PILLETS

Has Many Advantages Over Other Heart Stimulants

IT HAS NO CUMULATIVE ACTION, AND IS ABSOLUTELY SAFE AND RELIABLE

Each pillet represents one one-hundredth of a grain CACTINA the active proximate principle of CEREUS GRANDIFLORA

DOSE: One to four pillets three times a day

Samples mailed to physicians only

SULTAN DRUG COMPANY
St. Louis, Mo.

Digitized by Google

Business Chances.

Practices and Property wanted and for sale.

☞Notices will be inserted in this column for 2 cts. a word; twenty-five words will be inserted one time free for subscribers.

FOR SALE. — One eight-room two-story house, located on a full block of land. Barn, including stable, buggy house, etc., also cistern. Cash practice this year over $2000. Price, $2000. Address, with stamp, T, care News.

FOR SALE.—Two-story dwelling with modern conveniences, with six acres of land with improvements. Cost over $7000, Cash collections from practice first five years $3000 a year. Will sell at a bargain and introduce uyer. Addresbs: A. R. W., care Texas Medcal News.

CUBAN CIGAR FACTORY

MANUFACTURES

HIGH GRADE CIGARS.

Box Trade Especially for Doctors.

Come in and see us make them.

Joe Amstead,

Proprietor.

809 Congress Avenue.

The N. Y. SCHOOL of PHYSICAL THERAPEUTICS

Devoted to Post Graduate Instruction in subjects not generally taught in Medical Colleges.

PHOTOTHERAPY	Margaret A. Cleaves, M.D.
ELECTRO-STATIC and HIGH FREQUENCY CURRENTS,	Wm. Benham Snow, M.D.
DIETOTHERAPY and STOMACH ANALYSIS	Sigismund Cohn, M.D.
ELECTRO-CHEMICAL SURGERY	G. Betton Massey, M.D.
EXERCISE-THERAPY	Watson L. Savage, M.D.
ALTERNATING and CONTINUOUS CURRENTS	Morris W. Brinkmann, A.B. M.D.
PSYCHIATRY	Leslie Meacham, M.D.
RADIOGRAPHY	Herman Grad, M.D.
MECHANICAL VIBRATION THERAPY	Arnold Snow, M.D.
THERMOTHERAPY	David E. Hoag, M.D.
RADIOTHERAPY	Wm. Benham Snow, M.D.

The course consists of lectures and demonstrations in the clinics of the various departments.

For Further Particulars Address

WM. BENHAM SNOW, M.D., Pres., 465 Lexington Ave., N. Y. City.

Von Boeckmann-Jones Company,

Austin, Texas.

CONTRACTORS FOR STATE PRINTING.

Are well supplied for

Book and Job Printing of All Kinds.

Commercial Work a Specialty.

An Elegant Suburban Home. Large, Shady Grounds. Retired Location.

Newly furnished. Facilities for Hot, Cold, Neutral, Shower, Steam, Medicated, Vapor and Electrical Baths. Massage and physical training when needed. Static and other forms of electricity. Billiards, pool and other games for amusements. Ample protection for ladies. Long distance telephone in building. Terms on application.

DR. PETTEY'S RETREAT

FOR THE TREATMENT OF

ALCOHOL AND DRUG ADDICTIONS

Methods employed render the morphine addiction the most certainly and readily curable of all the chronic ailments.

GEO. E. PETTEY, M. D., 958 Davis Ave. Memphis, Tenn.

Digitized by Google

J. M. Reuss, M. D. J. H. Reuss, M. D.

DRS. REUSS & REUSS,

PHYSICIANS AND SURGEONS.

Practice limited to General Surgery and Diseases of Women.

CUERO, - - - - - TEXAS.

DR. J. B. SHELMIRE,

Practice limited to

SKIN, GENITO-URINARY AND RECTAL DISEASES.

Office Hours, 9 to 12 a. m., and 3 to 5 p. m.

504-505 North Texas Bldg., Dallas, Texas.

J. WALTER TORBETT, M. D.

PRACTICE LIMITED TO

CHRONIC DISEASES.

Attending Physician Bethesda Infirmary.

MARLIN, TEXAS.

W. H. BLYTHE, M. D.,

MOUNT PLEASANT, TEXAS.

GENERAL OFFICE PRACTICE,

AND

ELECTRO-THERAPY, THERMO-THERAPY, PHOTO-THERAPY, VIBRO-THERAPY AND RADIOGRAPHY.

MATTHEW M. SMITH, M. D.,

PHYSICIAN AND SURGEON . . . . .

P. O. Box 471. Both Phones.

AUSTIN, - - - - - TEXAS.

BOYD CORNICK, M. D.,

DISEASES OF THE LUNGS.

SAN ANGELO, - - - - TEXAS.

DR. EDWARD H. CARY,

Practice limited to

EYE, EAR, NOSE AND THROAT.

Rooms 303-4-5 Linz Building.
Telephone 1753.

DALLAS, - - - - - TEXAS.

DR. H. G. WALCOTT,

Practice limited to

DISEASES OF THE STOMACH AND INTESTINES.

Office, Linz Building, Rooms 709, 710.
Office Hours, 9 to 12 a. m.; 3 to 5 p. m.
Sundays by Appointment.

'Phone 3361. DALLAS, TEXAS.

J. E. GILCREEST, M. D.

Practice limited to

Surgery, Gynecology and Consultations.

GAINESVILLE, - - - - - TEXAS.

B. E. WITTE, M. D.

Diseases of the

STOMACH AND INTESTINES.

Rooms 3 and 4, Hicks Building.

SAN ANTONIO, - - - - - TEXAS.

OLIVER BRUSH,

AGENT FOR

ELECTRO-MEDICAL APPARATUS, X-RAY TUBES, AND FLUOROSCOPES.

Static Machines, Coils and Medical Batteries Put in Running Order.

AUSTIN, TEXAS.

GRACE & GREENWOOD,

PHYSICIANS AND SURGEONS.

SEGUIN, TEXAS.

Seguin is on the Southern Pacific R. R. One hour's run from San Antonio, and on the Guadalupe river. Population, 5500. Elevation, 550 ft. Climate delightful and healthful.

Digitized by Google

(*When you prescribe it you know what it is.*)

ANEDEMIN

A reliable remedy for the *rapid removal* and *permanent relief* of *local* and *general dropsical conditions* due to cardiac, renal or hepatic disease or inflammations of the peritoneum, pleurae or other serous cavities.

A Common Remedy for the Common Symptom, Dropsy.

A scientific combination of three of the more recently investigated members of the Digitalis series—Apocynum, Strophanthus, and Squill with Sambucus, forming a combination which, like *Digitalis*, improves the tone of the heart muscle and diminishes pulse frequency. *Unlike Digitalis* it produces vaso-motor dilitation, (rapid lymphathic elimination) purgation, efficient diuresis, is not cumulative and is non-toxic.

You Should Prescribe It.

Because you are not getting results with Digitalis.
Because you can get more satisfactory results with Anedemin.
Because it is harmless and does not exhaust your patient.
Because it produces ideal conditions for the repair of organic lesions.

Advertised to physicians only. Ten days treatment sent any physician on application.

Manufactured and for sale by

THE RUTLEDGE CHEMICAL COMPANY,

Fort Worth, Texas, U. S. A.

(*When you administer it you know how it acts.*)

Digitized by Google

W. A. HARPER, M. D.,

Practice limited to diseases of

EYE, EAR, NOSE AND THROAT.

Office: Smith Building.

AUSTIN, - - - - - TEXAS.

RALPH STEINER, M. D.,

Practice limited to

EYE, EAR, NOSE AND THROAT.

Office over Central Drug Store.
Office Hours, 9 a. m. to 1 p. m.,
3 p. m. to 6 p. m.

AUSTIN, - - - - - TEXAS.

Nixon Commercial College.

A High Grade Institution.

Prepares Students for Commercial Teaching and the good paying office positions. Business men are begging for competent help. High Schools, Literary and Business Colleges can not get qualified commercial teachers at a big salary. The **demand is for the best,** and our students get it. We charge you for instruction, not seating room. Address,

M. C. NIXON,

700 Congress Ave., Austin, Texas.

ISAAC'S COMBINATION EXAMINING TABLE AND CHAIR No. 5250.

THE

Hospital Supply Co.,

228 Fourth Ave., N. Y. City,

Manufacturers of

Hospital Furniture,
Sterilizers,
Glassware,
Enamelware,
Etc.

Digitized by Google

Follow the Flag.

WABASH ROUTE

TO

New York, Boston, Niagara Falls, Detroit, Chicago and all Eastern Cities.

The shortest and only line from Kansas City or St. Louis running over its own tracks to Niagara Falls or Buffalo. Time and equipment unexcelled.

Three Solid Fast Through Trains Daily.

Leaving St. Louis	9:00 a. m.	8:30 p. m.	11:32 p. m.
Arriving in Buffalo	4:05 a. m.	6:50 p. m.	7:50 p. m.
Arriving in New York	3:15 p. m.	7:40 a. m.	7:30 a. m.
Arriving in Boston	5:20 p. m.	10:05 a. m.	10:30 a. m.

Stop-over allowed on all tickets via Niagara Falls. Meals served in Wabash Palace Dining Cars.

Hours of Valuable Time are Saved

by purchasing tickets via Wabash Route. Consult ticket agents of connecting lines, or address

W. F. CONNER, S. W. P. A.,
353 Main Street, Dallas, Texas.

MOTTO FOR 1904

USE THE

HOUSTON AND TEXAS CENTRAL R. R.

It Taps the Best Section of Texas and Reaches Every City of Importance.

Free Chair Cars and Through Sleepers

To

Dallas, Austin, Waco, Fort Worth, Denison, Houston, Corsicana.

Send 10c. in stamps for a copy of the **Southern Pacific Rice Cook Book,** containing 200 recipes.

T. J. ANDERSON,
Assistant General Pass. Agent.

M. L. ROBBINS,
General Pass. and Ticket Agent.

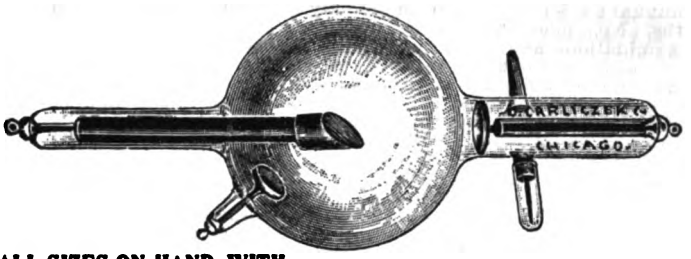
Houston, Texas.

Digitized by Google

Do You Want the Best **German X-Ray Tubes** at a Rock-Bottom Price?

THEN ASK YOUR DEALER FOR THE CELEBRATED

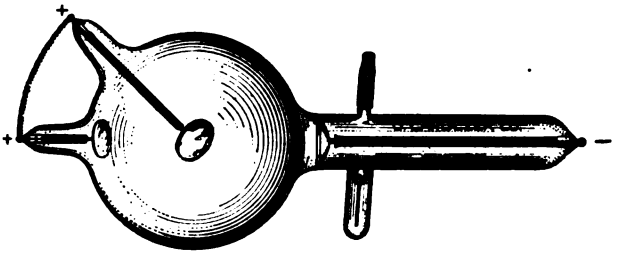
GUNDELACH AND MUELLER (GENUINE) TUBES



IF HE DOES NOT KEEP THEM, SEND DIRECT TO US. WE HAVE THEM.

ALL SIZES ON HAND, WITH AND WITHOUT REGENERATING ATTACHMENT.

SPECIAL TUBES FOR HEAVY RADIOGRAPHIC WORK.



OTTOMAR CARLICZEK CO.,

908 Schiller Building, Chicago.

New York Post-Graduate Medical School and Hospital,

UNIVERSITY OF THE STATE OF NEW YORK.

(FOUNDED 1882.)

This is the first institution in America founded for giving graduates in medicine the advanced instruction in clinical medicine and surgery. The Hospital contains 204 beds. The Winter term began on Oct. 1st.

FACULTY:

SURGERY.—Seneca D. Powell, M. D., LL. D., W. B. DeGarmo, M. D., Daniel Lewis, M. D., Willy Meyer, M. D., Samuel Lloyd, M. D., Robert T. Morris, M. D.
ORTHOPAEDIC SURGERY.—W. O. Plimpton, M. D., Henry L. Taylor, M. D.
DISEASES OF THE RECTUM AND ANUS.—Samuel G. Gant, M. D.
MEDICINE.—William H. Porter, M. D., Stephen S. Burt, M. D., George B. Fowler, M. D., Frederick Bagoe, Ph. D., Reynold W. Wilcox, M. D., LL. D., Leonard Weber, M. D., Max Einhorn, M. D., J. E. Stubbert, M. D., Simon Baruch, M. D., Edward Quintard, M. D.
PATHOLOGY, HISTOLOGY AND BACTERIOLOGY.—Henry T. Brooks, M. D.
GYNAECOLOGY.—Bache Mc. E. Emmet, M. D., J. R. Nilsen, M. D., H. St. J. Boldt, M. D., A. Palmer Dudley, M. D., G. M. Edebohls, M. D., Ralph Waldo, M. D., James N. West, M. D.
DISEASES OF CHILDREN.—Henry D. Chapin, M. D., Augustus Caille, M. D.
DISEASES OF THE SKIN.—W. Bedford Brown, M. D., Charles W. Allen, M. D.
DISEASES OF THE EYE.—D. B. St. John Roosa, M. D., LL. D., J. B. Emerson, M. D., Francis Valk, M. D., Edward S. Peck, M. D., Frand Van Fleet, M. D., A. Edward Davis, M. D.
DISEASES OF THE EAR.—D. B. St. John Roosa, M. D., LL. D., J. B. Emerson, M. D., Wendell C. Phillips, M. D., James F. McKernon, M. D.
DISEASES OF THE NOSE AND THROAT.—Clarence C. Rice, M. D., H. Beaman Douglass, M. D.
DISEASE OF THE MIND AND NERVOUS SYSTEM.—Graeme M. Hammond. M. D., William J. Morton, M. D., Joseph Collins, M. D.
OBSTETRICS.—C. A. von Ramdhor, M. D., George L. Brodhead, M. D., J. O. Polak, M. D.
VENEREAL AND GENITO-URINARY DISEASES.—Eugene Fuller, M. D., Ramon Guiteras, M. D.
SURGICAL ANATOMY AND OPERATIVE SURGERY ON THE CADAVER.—John J. McGrath, M. D.

For further particulars, address

FORBES HAWKES, M. D.,
SECRETARY OF THE FACULTY,
SECOND AVENUE AND TWENTIETH STREET, NEW YORK CITY.

D. B. ST. JOHN ROOSA, M. D., LL. D., PRESIDENT.

Digitized by Google

THE UNIVERSITY OF TEXAS,

MEDICAL DEPARTMENT.

GALVESTON, TEXAS.

SCHOOL OF MEDICINE.

The fourteenth annual session will begin on Monday, October 3, 1904, and continue for eight months. No student will be admitted to the classes after November 1, 1904. Entrance examinations and examinations for advanced standing will be held during the two weeks preceding the opening of the session. Entrance examinations upon English, arithmetic, algebra through quadratic equations, plane geometry, and general history. Examinations for advanced standing upon subjects covered by classes for which candidates apply. Exemption from entrance examinations granted graduates of approved universities, colleges, normal schools, high schools and academies, students of other departments of the University of Texas and of the Agricultural and Mechanical College of Texas, and holders of first grade teachers' certificates. Four years graded course.

The course of instruction includes the usual systematic and clinical lectures, together with thorough laboratory work in anatomy, general biology, embryology, normal histology, chemistry, physiology, bacteriology, pharmacy, operative surgery, clinical technology, pathological histology, gross morbid anatomy and autopsy-making, together with a large amount of bedside, dispensary and ward-class work in the various clinical subjects in John Sealy Hospital.

The resources for illustration of medical ailments, surgical affections and accidents, and their management, are ample. Daily clinics are given throughout the entire course by members of the Faculty and by special lectures. Much attention is devoted to bedside instruction, in which the students are required to accompany the teachers through the wards and practically acquire the methods of diagnosis and treatment.

The outdoor clinics have been organized so that each fourth-year student receives the benefit of a period of this clinical work, in its several departments—medicine, surgery, obstetrics and gynecology, and special diseases.

The wards of St. Mary's Infirmary, an excellent hospital under the care of the Sisters of the Incarnate Word, at Market and Eighth streets, two blocks from the College, are also drawn upon for clinical subjects by those of its staff who are connected with this school.

SCHOOL OF PHARMACY.

The twelfth annual session will open and continue as above indicated for the SCHOOL OF MEDICINE and the requirements for admission and advanced standing are identical with the above. Two years graded course, including the usual systematic lectures and thorough laboratory training in prescription compounding, drug analysis and assaying, general pharmacy, microscopic pharmacognosy, vegetable histology and botanical analysis and classification, and in general and pharmaceutical chemistry.

SCHOOL OF NURSING.

Two years graded course of training, open to women only. Applicants accepted as vacancies occur, as nearly as possible on June 1 of each year; applicants must present evidence of mental, moral and physical fitness for the work. Pupil nurses accepted or rejected after two months probation. They are furnished lodging, board, uniform clothing and laundry free in the Nurses' Home of Sealy Hospital, and are given systematic instruction by lectures, demonstrations and quizes as well as by a large practical experience gained in their daily ward duties in the hospital.

Library of over 5000 volumes; reading room supplied with the current numbers of the better general and special, medical and pharmaceutical journals.

Museums in connection with the chairs of anatomy, materia medical pharmacy and pathology contain a large number of illustrative specimens and are constantly being added to.

Women students in medicine and pharmacy admitted to University Hall, which has this year been endowed for five years by private benefaction, where lodging and room-service of a homelike character under the supervision and control of a matron will be furnished at a low rental during the period of endowment. Two annual scholarships of $240.00 and $200.00 are open to those two women of the medical class who, after the close of their freshman term of study, have attained appropriate general averages of proficiency in their work.

Fees in ***Medicine*** amount for the entire course of four years to $95.00, paid as follows: first year, $50.00; second year, $20.00; third year, $20.00; fourth year, $5.00; in ***Pharmacy*** for the two years course to $50.00, paid as follows: first year, $40.00; second year, $10.00; no fees in the school of nursing. Non-residents of the State of Texas are required to pay an annual tuition fee of $50.00 in addition to above in the Schools of Medicine and of Pharmacy.

For catalogue or special information, address

DEAN,

Medical Department of University of Texas, Galveston, Texas.

Digitized by Google

California

One way Colonist Tickets over the

Santa Fe

Tourist Sleepers Every Tuesday—Meals Served at the World Famous Santa Fe Eating Houses.

For only $25

Oil-Burning Engines—Oil-Sprinkled Track—A Dustless Ride Across the Continent.

Any Santa Fe Agent will give full particulars.

W. S. KEENAN, G. P. A.,
Galveston, Texas.

"Santa Fe all the Way"

FROM TEXAS

To Colorado To Arizona

And the Grand Canyon

To California

To Kansas City To Chicago

To St. Louis

Magnificent Trains—A Dustless, Well Ballasted Road—A System of World Famous Eating Houses. Ease, Comfort, Speed, Luxury. That's Wha You Get on the

Santa Fe

Ask for Detail Information. Addres

W. S. KEENAN, G. P. A.,
GALVESTON, TEXAS.

I. & G. N.

TO

St. Louis

1904

The "True St. Louis World's Fair Line."

MILES
MINUTES
MONEY

Saved via the I. & G. N.

100 to 200 Miles Shortest

World's Fair

4 to 8 Hours Quickest From Texas.

Watch for Our Announcement Extraordinary.

D. J. PRICE,
General Passenger and Ticket Agent.

L. TRICE,
2d Vice-Pres. and Gen'l Mngr.
"The Texas Road." Palestine, Texas.

Digitized by Google

Northwestern University

Medical School.

(Chicago Medical College.)

Dr. N. S. Davis, Jr., Dean.
Dr. W. S. Hall, Junior, Dean.

Four Hospitals with 800 Beds. Ward walks for every Senior. A dispensary treating 25,000 patients a year.

New Buildings and Equipment.

A Superior Faculty. A Reputation as a Leader in Medical Education. For announcements and particulars address,

DR. ARTHUR R. EDWARDS, Sec'y, 2431 Dearborn St., Chicago.

Digitized by Google

MEDICAL DEPARTMENT

Fort Worth University,

FORT WORTH, TEXAS.

10th Annual Session Opens Thursday, October 1st, 1903.

A four years' graded course. Is a member of the Association of Southern Medical Colleges. Requires a preliminary examination before matriculation. Maintains a high standard of scholarship. Has an excellent corps of Professors, Lecturers and Demonstrators.

Possesses a fine, commodious brick building, situated a half block from the intersection of all the principal street car lines; consequently in the center of the city and the field of clinical material. A free dispensary maintained by the College gives unusual clinical advantages. Four hospitals and private sanitariums, under the charge of the professors, with a capacity of 300 beds, affords fine hospital and bedside instruction.

For further information or a catalogue address

BACON SAUNDERS, M. D., Dean.

Annual Tuition, including matriculation fee, dissecting ticket. Chemical and Pathological Laboratories, $75. Graduation fee, $25.

ONE HUNDRED FOR $1.00

Have You Tried Naphey's Wafers?

They are unsurpassed as a positive and speedy cure for diseases of women. They have been successfully prescribed by physicians for ten years. We have increased the size of boxes from 25 to 100, which we are selling at the same price, $1.00 PER BOX, which puts them in the reach of every physician for office use.

Send for Free Samples and Literature.

NAPHEY & CO., Warren, Pa.

DR. MOODY'S SANITARIUM,

SAN ANTONIO, TEXAS,

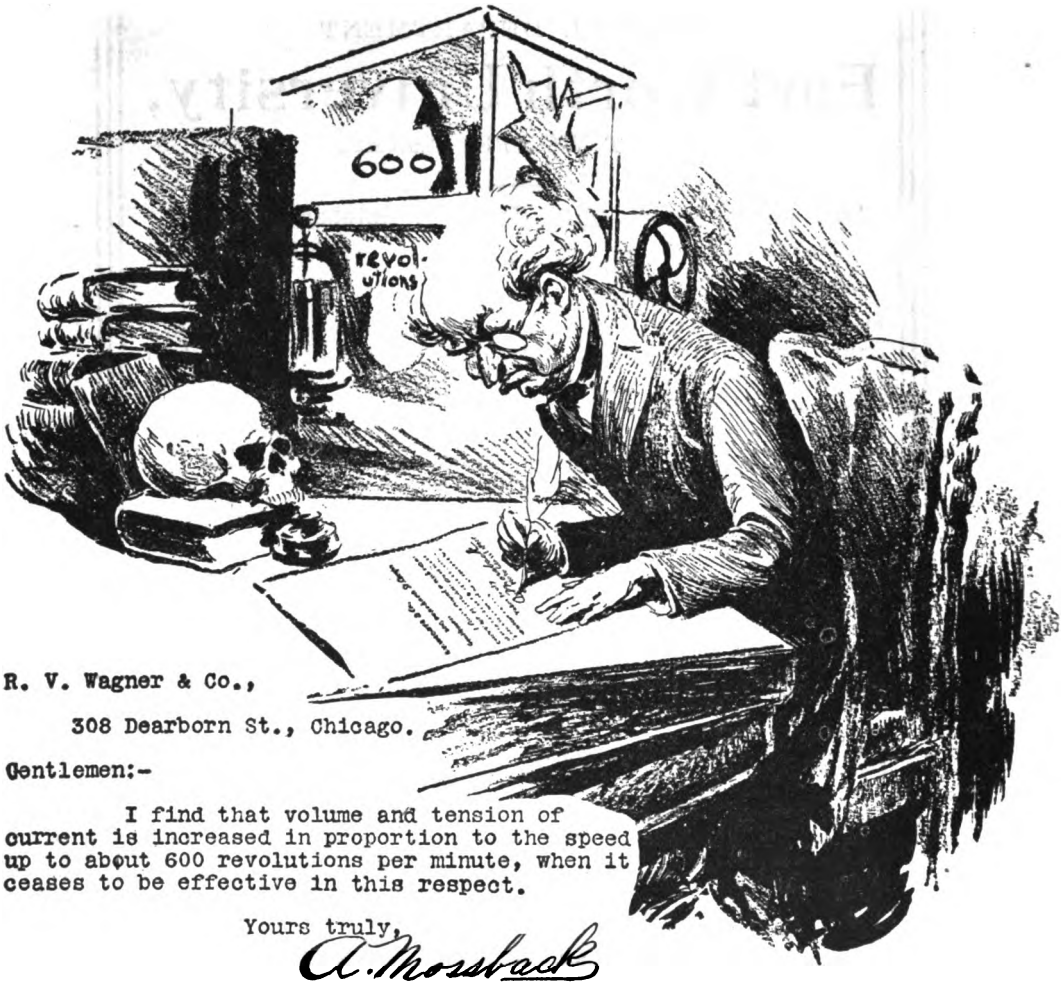
For the care and treatment of Nervous Diseases, selected cases of Mental Disease, Drug and Alcohol Addictions, and nervous invalids needing rest and recuperation. Home comforts, institutional features eliminated. An elegant two-story brick building with porches and galleries up and down stairs. The interior is of excellent material and design, elegantly furnished, electric lights, hot and cold water, and excellent plumbing throughout. Modern Hydro-therapeutic, Electro-therapeutic and Gymnastic Equipments. Location ideal, being upon an elevation overlooking the entire city. Grounds capacious, well shaded and well drained. Quiet and secluded, yet convenient to street car and city. Within five minutes walk of Brackenridge Park, covering 200 acres, with its lovely walks, drives, shades and flowers. In San Antonio's dry and healthful climate the opportunities during the entire year for exercise, pure, fresh air and sunshine are unsurpassed, and in these all are encouraged by attractive out-door games, by walks, and by drives through the city and country. Address,

G. H. MOODY, M. D.,

(For 6 years Assistant Physician to State Asylums at San Antonio and Austin, Texas.)

315 Brackenridge Avenue, SAN ANTONIO, TEXAS.

Digitized by Google



R. V. Wagner & Co.,

308 Dearborn St., Chicago.

Gentlemen:-

I find that volume and tension of current is increased in proportion to the speed up to about 600 revolutions per minute, when it ceases to be effective in this respect.

Yours truly,

A. Mossbach

Glass Plate Expert.

Mica Plate Static Machines

Operate at upwards of 2,000 R. P. M. Safely, and increases volume and tension of current all the way. Renders 2 Mica plates equal to 10 glass ones; simplifies construction; makes machine more reliable and less sensitive to dampness; produces high tension current best adapted to X-Ray and most therapeutic purposes.

R. V. WAGNER & CO.

308 Dearborn St., CHICAGO
1 Madison Ave., NEW YORK

Digitized by Google

AMENORRHEA
DYSMENORRHEA
AND OTHER
Irregular Menstruation

The highest therapeutic qualities for the advanced scientific treatment of all menstrual disorders is embodied in

ERGOAPIOL—SMITH

Viz.:—

DIRECT and SPECIFIC TREATMENT.
CURATIVE PROPERTIES.
INCOMPARABLE MERIT.

The absence of all Narcotics, Opiates, and Analgesics, yet possessing remarkable efficacy in relieving all pain and other distressing symptoms, is its exceptional, commendable feature.

Literature, etc., supplied.

MARTIN H. SMITH CO.,
New York, N. Y.

To obviate any possible error in dispensing, it is advisable to prescribe and specify as here shown:

Ergoapiol. (Smith)... Caps. XX.
Orig. pack.

Digitized by Google

Progress in Genito-Urinary Therapeutics

Shows no advance more important than the introduction of

URISEPTIN

Liberates Formaldehyd slowly in the Kidneys **Makes the Urine Antiseptic**

Keeps the Urinary Tract Aseptic

The ONLY Urinary Antiseptic with Diuretic and Soothing properties

URISEPTIN is a distinct advance because it renders possible Antisepsis of the Urinary Tract by internal medication. Urine voided thirty minutes after the taking of a tablespoonful of Uriseptin is antiseptic to such an extent as to be a bactericide to pyogenic germs. In CYSTITIS relief is prompt, and results are continuous. In URETHRITIS, during the Acute Stage, pain is lessened, inflammation and further infection prevented. Chronic Urethritis—Bacteria are destroyed, the surfaces soothed, and healing is prompt. The results are the same in all inflammatory conditions of the urinary tract. Uriseptin has the endorsement of sixty per cent of the members of the "American Association of Genito-Urinary Surgeons" as being the best palliative treatment for Prostatic Hypertrophy.

FORMULA AND DOSE.

Each fluid ounce contains 24 grains of Lithium Methaminate (Lithium Salt of Formaldehyd) dissolved in Aqueous Extract of Corn Silk and Couch Grass.

One or two teaspoonfuls 4 times a day, preferably in hot water.

Full information furnished physicians on request, or eight-ounce bottle sent express paid on receipt of twenty-five cents.

GARDNER-BARADA CHEMICAL CO.

CHICAGO, U. S. A.

42 RIVER STREET.

INDICATED IN

NEPHRITIS	PYELITIS
URETHRITIS	CALCULUS
RHEUMATISM	GOUT
GONORRHEA	GLEET
BACTERIURIA OF SCARLET, TYPHOID AND OTHER FEVERS	PNEUMONIA

McIntosh Galvanic and Faradic Table or Wall Plate No. 6

Can be arranged for use with 110 VOLT DIRECT CURRENT or BATTERY OF AMMONIUM CHLORIDE CELLS.

This most desirable office outfit consists of a plate of Highly Polished Marble, upon which is mounted:

A Faradic Coil, giving Primary and Secondary Currents.

A Graphite Rheostat, controlling both Galvanic and Faradic Currents.

A Milliamperemeter, measuring the Galvanic Current.

Graduated Automatic Rheotome, interrupting the Galvanic and Faradic Currents.

Pole-Changer Switch, binding posts, etc., arranged in a simple and practical manner, so as to afford ease in operation and to remove any possibility of confusion in the selection of currents.

We supply the plate, alone, of Tennessee or Italian Marble, also in Wall or Floor Cabinet.

Send for Illustrated Catalogue.

McINTOSH BATTERY & OPTICAL CO.

39 W. Randolph St., Chicago, Ill.

Digitized by Google

Spring and Summer Furnishings

FOR

LADIES AND GENTLEMEN

At prices that should interest every member of the Texas Medical Association and his lady visiting Austin.

Fancy Spring Suits; choice fabrics and styles,

$22.50, $17.50 AND $15.00.

Light two-piece suits, neat, comfortable and economical,

$16.50, $11.50 AND $9.00.

Fine Black Dress Suits; a full line at bargain prices,

$23.50, $18.00 AND $15.00.

Shirt Waist Suits

The most popular spring garment; pretty, washable, comfortable and easily put on.

Shirt Waist Suits of superfine India linen,

$16.50.

Shirt Waist Suits, fine French linen,

$15.50, $7.50, $5.75

Shirt Waist suits, French lawn,

$4.50.

Scarbrough & Hicks,

AUSTIN, TEXAS.

Digitized by Google

Bosche's Troy Laundry

Will look after your linen while in the city. Everything FIRST CLASS and work done on short notice.

806 CONGRESS AVE. Both Phones 73.

WE CALL FOR AND DELIVER

To The Doctors:

During your stay in town—the fact that you are a doctor entitles you

TO 20 Per Cent Discount

on the finest stock of BOOKS and PICTURES in this section. Come in and meet us. We are willing to pay this to see you.

Capital City Book Co., 908 CONGRESS AVENUE.

HANCOCK HOTEL

L. Y. HANCOCK, Proprietor.

Adjoins Hancock Opera House, Post-Office and Masonic Temple. Elegant Office, Dining Room.

40 FIRST-CLASS ROOMS
Terms: $2.00 to $2.50 Per Day

Commercial Trade Specially Solicited

AUSTIN, TEXAS

AVENUE HOTEL

Austin, - - - - - - Texas.

Most centrally located, with more pleasant outside rooms than any hotel in city. Rates: $2.00 and $2.50 per day. Special rates to parties.

D. M. Wilson, - - Manager.

Digitized by Google

WHEN you come to Austin remember that the retail prices prevailing are lower than in any other city of the State. And you will find this store has better values than any other here.

A. F. HARDIE

Next to the Driskill Hotel, on East 6th St.

A Complete Stock of Dry Goods, Notions, Clothing, Shoes, and Millinery.

We are showing a full line of the newest novelties in all lines. In Dress Goods we have a beautiful assortment of Lawns, Swisses, Tissues, Voiles, and all of the latest in Summer Silks at prices that will be a revelation. For instance, a 27-inch Japanese Silk, guaranteed water and stain proof, in a full line of colors, for only - - - - - - - - **75c**

Our Millinery Department is a specialty, and our competent corps of trimmers are at your disposal for anything that you may desire in this line.

In our other departments you will find everything worn by a man, woman or child, and the prices are the very lowest consistent with quality.

We take pleasure in backing the above statements with our reputation.

"You Ought to Know Us."

A. F. HARDIE

SPENCE HARDIE, Manager

Corner 6th and Brazos **Austin, Texas**

Digitized by Google

High Grade Furnishings,
Hats and Shoes.

CORRECT STYLES.

WRIGHT & ROBINSON.

616 Congress Ave. Austin, Texas

GEO. W. PATTERSON,

ECLIPSE STABLES.

Fine Carriages. Light Livery. Omnibus and Baggage Transfer.
Transfer Agent on all Trains.

108 to 116 East Seventh Street. - - BOTH PHONES 161.

AUSTIN, TEXAS.

EMIL RISSE,

PHOTOGRAPHER.

Has the best equipped studio in
Austin and guarantees . . . . . .

STRICTLY FIRST CLASS WORK
at a very reasonable price. . . .

612 Congress Avenue.

As Spectacles and Eye Glasses are my specialty you will find it an absolute certainty that my ℞ work for lenses is most accurate and up to the mark.

I also carry a full stock
of Artificial Eyes.
Orders promptly attended to.

S. GREENBERG, Exclusive Optician.
769 Congress Ave. AUSTIN, TEXAS.
New Phone 885.

SOL DAVIS,

Dealer in Imported
and Domestic

CIGARS AND TOBACCOS.

Billiard and Pool Parlor.

A full line of stationery, periodicals, books and news. Wiley's Candies.

705 Congress Avenue.
Phones 398.

Digitized by Google

STATE HEADQUARTERS T. P. A.
ALSO POST "F" T. P. A.

THE DRISKILL

AUSTIN, TEXAS.

The Most Popular Most Commodious Hotel in the South

Fine Rooms, Comfortable Beds and Unexcelled Kitchen. Artesian Water Throughout. . .

An Up-To-Date Laundry Run in Connection With the HOTEL.

Digitized by Google

W. T. WROE & SONS,

FOR HIGH GRADE

Saddles, Harness, Buggy Whips, Lap Dusters.

Kauffman Buggies.
Hynes Buggies,
H. H. Babcock Buggies,
Columbus Buggies.

421 and 423 Congress Ave. **Austin, Texas.**

THE ATTENTION OF

VISITORS TO NEW YORK

Is Called to the Advantages in Location,
Accommodation and Rates Offered by the

HOTEL ENDICOTT,

81st and 82d St. and Columbus Ave.

European Plan: $1.00 Per Day and Upward.
American Plan: $3.00 Per Day and Upward.

INCLUDING BATH.

Every Appointment New and Clean. Excellent Restaurant. Orchestral Concerts Daily. Coolest Location. Surrounded by Parks. Convenient to All Parts of the Metropolis.

Send for the New York Guide (free), giving photographs of the Parks, Great Buildings and Residences, entitled "New York Sky Lines." Correspondence solicited.

WM. F. INGOLD.

Digitized by Google

UNIVERSITY OF MICHIGAN
3 9015 07021 8006

The Survival of The Fittest

To obtain immediate results in

Anaemia, Neurasthenia,

Bronchitis, Influenza, Pulmonary Tuberculosis,

and during Convalescence after exhausting diseases employ

Fellows' Syrup of Hypophosphites

Contains—Hypophosphites of Iron, Quinine, Strychnine, Lime, Manganese, Potash.

Each fluid drachm contains the equivalent of 1-64 grain of pure strychnine.

Special Note.—

Fellows' Hypophosphites ***Is Never Sold in Bulk.***

Medical letters may be addressed to

MR. FELLOWS,

26 Christopher St., New York.

Digitized by Google

ANTIDIPHTHERITIC SERUM

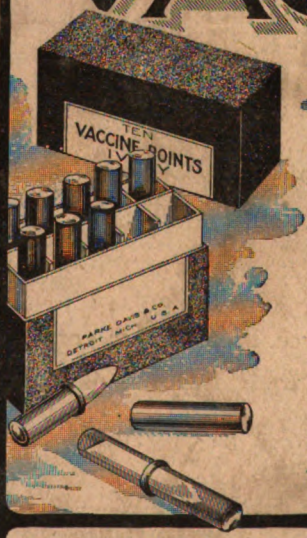
BULB-SYRINGE CONTAINER (STYLE A)

PREPARED WITH EXTRAORDINARY CARE.
RIGIDLY TESTED, BACTERIOLOGICALLY AND PHYSIOLOGICALLY.
SUPPLIED IN HERMETICALLY SEALED GLASS CONTAINERS,
EFFECTUALLY PREVENTING CONTAMINATION

OUR READY-TO-USE BULB AND PISTON SYRINGES REPRESENT
THE ACME OF ASEPSIS AND CONVENIENCE.

PISTON-SYRINGE CONTAINER (STYLE C)

VACCINE



THE USE OF OUR BACTERIOLOGICALLY AND PHYSIOLOGICALLY TESTED VACCINE (GLYCERINATED) INSURES

A HIGH PERCENTAGE OF SUCCESSFUL VACCINATIONS;

IMMUNITY FROM ACCIDENT OR UNTOWARD EFFECT.

Capillary Glass Tubes, hermetically sealed, boxes of 10 and 3.
Ivory Points, each in a Lee glass tube, hermetically sealed.

PARKE, DAVIS & CO.

LABORATORIES: DETROIT, MICH., U.S.A.; WALKERVILLE, ONT.; HOUNSLOW, ENG.
BRANCHES: NEW YORK, CHICAGO, ST. LOUIS, BOSTON, BALTIMORE, NEW ORLEANS, KANSAS CITY, MINNEAPOLIS, INDIANAPOLIS, MEMPHIS; LONDON, ENG.; MONTREAL, QUE.; SYDNEY, N.S.W.; ST. PETERSBURG, RUSSIA; SIMLA, INDIA; TOKIO, JAPAN.

Digitized by Google